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ABSTRACT

The Department of Education has assembled 20 "indicators," drawn from the mass of available statistics on institutions, enrollments, finances, and staff, that describe the condition and progress of elementary and secondary education. Data are assembled under three categories of measures: outcomes, resources, and context of education. The section on outcomes contains such measures as the proportion of 18- to 19-year-olds who have graduated from high school, student achievement, and what students do after they graduate. Student performance data are drawn from the National Assessment of Educational Progress, the Scholastic Aptitude Test (SAT), and the American College Testing Program (ACT). A study by the International Association for Evaluation of Educational Achievement (IEA) compares mathematics achievement in grades 8 and 12 in the United States with that of comparable students from 18 other countries. The resources section contains data on such measures as fiscal resources, quantity and quality of the teaching force, estimated teacher supply and demand, and teacher earnings. The section which focuses on context of education includes such variables as instructional climate of the school, opinion and support of parents and the community, student characteristics, graduation requirements, and an index of state requirements for special educational services. Eleven appendixes provide supplementary data and a glossary concludes the report. (MLF)

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INDICATORS
of
Education Status and Trends

January 1985

EA 017 493

FOREWORD

At least as early as the mid-1860s there was an understanding that statistics and facts about education across our States and communities are necessary to inform actions of educators, legislators, board members and other policymakers.

From time to time that interest is rekindled when major education issues are brought to public attention—as they were, for example, at the time of World War I, during the Depression and after Sputnik. Such a time is again at hand as virtually every State is enacting or considering major changes in its curriculum, priorities, spending, teacher quality and rewards, and graduation requirements. With the strong involvement and support of the Education Leaders Consortium and with helpful advice and comments from many other individuals and groups, the Department of Education has prepared this first report on Indicators of Education Status and Trends. An additional appendix to this paper, including more charts and tables, will be available for comment during the Spring of 1985.

The intended audience for Indicators includes educators and policymakers and, of course, parents and the general public. The purpose is to assist educators and education policymakers by informing their decisions and to assist the general public by describing the "health" of American education. Local officials may not find all the details here that would be useful for them because the data are reported primarily on a national basis. On the other hand, they may have data about their own schools that can be compared with these figures, and thereby gain understanding as to appropriate actions that teachers or local school officials might take.

In many cases an optimum metric may not be available, or what is available may not be in the best form. Indeed, preparation of this first Indicators has served to identify areas where new collection efforts or additional analyses would be a high priority for the Department of Education.

If you have suggestions on this draft, or if you need additional information, please contact:

Dr. Ron Hall
Issues Analysis Staff
Office of the Under Secretary
U.S. Department of Education
Washington, D.C. 20202

or

Dr. Jay Noell
National Center for Education Statistics
U.S. Department of Education
1200 19th Street, N.W.
Washington, D.C. 20208 – 1402

We encourage use of this report in discussions and public forums, and invite comments as to how subsequent versions might be improved. Recurring issues of Indicators will come from the Department's National Center for Education Statistics. You may also wish to contact Emerson J. Elliott, NCES Administrator, to express your views of this document.

Gary L. Jones
Acting Secretary
U.S. Department of Education

ACKNOWLEDGEMENTS

Indicators of Education Status and Trends was developed by an Education Department work group coordinated by the Office of the Under Secretary. The Department gratefully acknowledges the dedication of the members of the work group and the cooperation of the offices they represent:

Office of Planning, Budget and Evaluation – Jan Anderson, Judith Anderson, Rob Barnes, Alan Ginsburg, Jack Klenk, Frank Nassetta.

National Institute of Education – Larry Rudner.

National Center for Education Statistics – John Christensen, Larry LaMoure, Jay Noell, Larry Suter, David Sweet.

National Commission on Excellence in Education staff – Tom Tomlinson.

Office of the Under Secretary – Andy Pepin, Joyce Stern.

In addition to the work group members, other staff of the Department provided valuable assistance and insight through review and comment on several drafts of Indicators, especially David Mandel, Charles Stalford, Allen Alexander, and Milton Goldberg.

The project was coordinated by Ron Hall, Office of the Under Secretary and Emerson Elliott, Administrator, National Center for Education Statistics (NCES).

Jeff Battershall provided especially valuable service as principal assistant to the project by preparing charts, tables and text and assembling complete drafts for discussion.

Numerous staff members of NCES have lent their guidance and expertise to this effort. Leslie Silverman and Norman Beller took the initiative in the first NCES efforts on Indicators with the Educational Leaders Consortium. For this first publication of Indicators, special appreciation is due to Joan Greer, Suellen Mauchamer, Mark Travaglini, and Philip Carr who assisted in final editing and artwork. Irma Johns and Sharon Jones prepared the final copy of text and tables, and Betsy Faupel compiled the Glossary that appears at the end of this document.

Development of this publication has proceeded with excellent cooperation and support by several groups and organizations outside the Federal Government. The Department is especially grateful to John Wherry, Chair of the Educational Leaders Consortium Task Force, George Rush and William Pierce of the Council of Chief State School Officers and a number of the Chief State School Officers themselves who assisted greatly in this work and encouraged its completion.

BACKGROUND

The concept of education "indicators" began to emerge in the 1970s as a concise set of measures by which the public, educators and policy makers might keep regularly informed on the progress and condition of education. It reflected a larger movement in the nation to define a set of measures, or "social indicators", that would keep our citizens informed on education, health, employment and other social issues.

Recent State legislation and executive action to strengthen education have helped renew interest in implementation of new policies and student achievement. Legislators and board members are increasingly insistent on demonstrated results and several States have already mandated periodic reports on such school characterics as student achievement, homework, dropouts, teacher quality and incentives for teacher performance.

DEPARTMENT OF EDUCATION PROJECT

In 1982, the National Center for Education Statistics and the Educational Leaders Consortium (ELC), a group of 16 national education organizations, began work on a project to develop and publish a set of education indicators. An ELC task force recommended lists of indicators to publish immediately and several others to develop for future use.

Other events over the past year have reinforced interest in this joint effort:

- In January 1984, the Secretary of Education released his first State education statistics chart that compared the States on a number of educational variables. A second chart was issued in December 1984.

- In December 1983 and in May and October 1984, the Department released reports detailing the extensive reforms that have been enacted or are proposed for implementation in the States.

- The policy committee of the National Assessment of Educational Progress announced a new policy under which States may volunteer to administer standardized and pre-packaged versions of National Assessment of Educational Progress (NAEP) tests that will make State representative data readily available.

- At their annual meeting in November 1984, the Council of Chief State School Officers adopted policies calling for more accurate and timely data and for more valid State-by-State comparative information.

Through the leadership of the Under Secretary of Education individuals in the Department responsible for widely separated activities were brought together in the interest of identifying appropriate measures of education progress. An internal working group in the Department was formed that developed this set of Indicators.

NATURE AND PURPOSE OF INDICATORS

The graphs and tables presented here describe the status and trends of education at the elementary and secondary levels. Future work will be needed to develop a similar set of measures for postsecondary education.

Because of gaps in the data and a lack of comparable data sets on some issues, these measures represent only an initial step in an ongoing process of development and refinement. This document is intended to

stimulate national discussion on the character of education indicators-- on the aspects of education that need to be measured and reported, on the specific indicators and the way in which they are presented, and also on areas where new collection efforts or additional analyses should become high priorities for the Department of Education.

For the purpose of this first Indicators, an "education indicator"

- consists of statistically valid information related to significant aspects of the educational system and can be a single valued statistic or a composite index;
- provides a benchmark for measuring progress or regression over time, or differences across geographical areas or institutions at one point in time, such that substantive inferences can be drawn from presentation of the data;
- is meant, where appropriate, to be representative of policy issues or aspects of education that might be altered by policy decisions;
- can be easily understood by a broad array of citizens concerned with education;
- is relatively reliable data and not subject to significant modification as the result of response errors or changes in the personnel generating it.

This collection of Indicators is divided into three areas-- Outcomes, Resources and Context of Education:

1. Outcomes — Among the categories of measures, the Outcomes of student participation in schooling are the most instructive indicator of the health and quality of education and trends over time. The primary outcome variable is, of course, student achievement. However, courses students take, the proportion of students who successfully complete the educational system (graduation from high school), what students do after leaving high school, and the extent to which students take up the responsibilities of citizenship also describe the effects of schooling.

   There are two additional indicators of the outcomes of schooling that will be included in this publication in future years as data become available. The first concerns literacy rates among the young adult population (ages 21-25). The National Assessment of Education Progress will conduct an assessment on this issue in 1985 and results will be available March 1986. The second concerns national trends on scores achieved by high school students who take the Armed Services Vocational Aptitude Battery. These data are now being reviewed for possible inclusion in the forthcoming appendix to this volume to be released in Spring 1985.

2. Resources — Fiscal resources can affect the delivery and quality of education. While relationships between these inputs and the outcomes of schooling are not always evident, the variables do indicate the status of basic tools at hand for support of instructional services.

   Among the input variables that are often used to explain the outcomes of schooling are the quantity and quality of the teaching force. Earnings and working conditions are often cited as factors that affect the recruitment and retention of sufficient numbers of qualified individuals in the teacher workforce.

3. Context of Education — The context within which education takes place can have a marked effect on the success of the teaching/learning experience. Among those variables that are important are the instructional climate of the school itself and the opinion and support of parents and

community. The level of student enrollment, and the needs that students bring to the school as a result of such factors as socioeconomic status, handicap and limited-English proficiency, affect the program of instruction fiscal and other resource support.

Other process variables that appear related to outcomes are those that reflect the interest and intent of public officials to improve some aspects of schooling over which they have control, such as State mandated curriculum standards.

Indicators will become a recurring publication of the Department and public comment is invited on this first version. During the next several months, Department staff will be analyzing those comments, and meeting with representative groups and experts in education data collection and reporting in a continuing effort to improve future versions of this report.

LIST OF INDICATORS INCLUDED IN THIS VOLUME

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OUTCOMES

STUDENT PERFORMANCE

An important indicator of the outcomes of our educational system is student performance. Measures of student performance represent the extent to which students master the content of schooling and student performance on standardized tests is the most widely used technique to define acquired ability or knowledge. Comparing the performance of students over time provides an indication of how well the system is meeting the goal of providing quality education to each successive student cohort.

The data presented here are drawn from the National Assessment of Educational Progress that tests the knowledge, skills, and attitudes of 9–, 13–, and 17-year-olds. Some caveats concerning these data are: NAEP measures what students know, not necessarily what has been taught in the schools; and NAEP cannot be disaggregated for State-by-State comparisons. Nonetheless, in terms of its content and representativeness of the general school population, it is the strongest set of measures of the attainment of American students in public and private elementary and secondary schools.

See Appendix pages A-1 through 3 for detail by race and ethnicity, sex, region and type of community.

Average Reading, Mathematics & Science Performance of 9-, 13-, and 17-Year-Old Students

Reading

	Mean Percentage of Correct Responses					
Age Group	1971	1975	Change	1975	1980	Change
9-year-olds	64.0	65.3	1.3	65.3	67.9	2.6
13-year-olds	60.0	59.9	−0.1	59.9	60.8	0.9
17-year-olds	68.9	69.0	*	69.0	68.2	−0.8

*Less than .05 percent.

Science

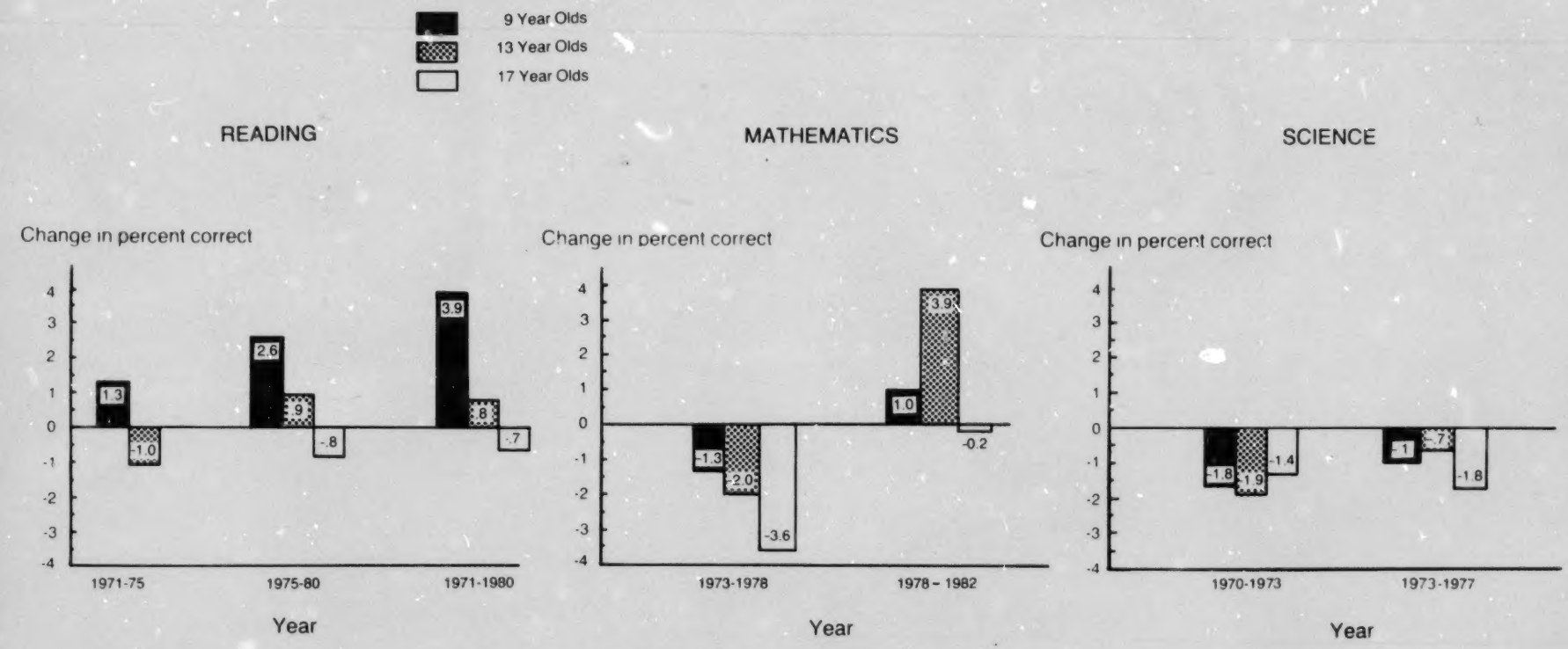
	Mean Percentage of Correct Responses					
Age Group	1969-70	1972-73	Change	1972-73	1976-77	Change
9-year-olds	60.6	58.8	−1.8	52.3	52.2	−0.1
13-year-olds	58.8	56.9	−1.9	54.5	53.8	−0.7
17-year-olds	44.2	42.8	−1.4	48.4	46.5	−1.9

Mathematics

	Mean Percentage of Correct Responses					
Age Group	1972-73	1977-78	Change	1977-78	1981-82	Change
9-year-olds	38.1	36.8	−1.3	55.4	56.4	1.0
13-year-olds	52.6	50.6	−2.0	56.6	60.5	3.9
17-year-olds	51.7	48.1	−3.6	60.4	60.2	−0.2

Source: National Assessment of Educational Progress

Changes In Reading, Mathematics And Science Performance of 9-, 13-, And 17-Year-Olds



Source: National Assessment of Educational Progress

- Over the past decade or so, reading, mathematics, and science performance is lower among 17-year olds. Among 9 and 13-year olds, reading and mathematics performance is higher while science achievement is lower.

Other standardized tests used in the U.S. to measure the performance of high school students are the Scholastic Aptitude Test (SAT) and the American College Testing Program (ACT). The results of these tests have been used widely by the media and education analysts as an indication of educational quality. In fact, however, these tests have been developed as predictors of potential college performance and they are taken by high school juniors and seniors who plan to apply for college admission. The caveats are: Persons taking the ACT and SAT are not representative of all American students; they are generally only those wishing to continue on to college; and, there is debate as to whether these tests measure aptitude or achievement. The SAT claims to measure "developed ability."

See Appendix pages A-4 to 5 for detail on high scoring students and pages A-6 for changes in State averages since 1980.

ACT Scores: 1971 to 1984

Year	English	Math	Social Studies	Natural Sciences	Composite
1970-71	18.0	19.1	18.7	20.5	19.2
1971-72	17.9	18.8	18.6	20.6	19.1
1972-73	18.1	19.1	18.3	20.8	19.2
1973-74	17.9	18.3	18.1	20.8	18.9
1074-75	17.7	17.6	17.4	21.1	18.6
1975-76	17.5	17.5	17.0	20.8	18.3
1976-77	17.7	17.4	17.3	20.9	18.4
1977-78	17.9	17.5	17.1	20.9	18.5
1978-79	17.9	17.5	17.2	21.1	18.6
1979-80	17.9	17.4	17.2	21.1	18.5
1980-81	17.8	17.3	17.2	21.0	18.5
1981-82	17.9	17.2	17.3	20.8	18.4
1982-83	17.8	16.9	17.1	20.9	18.3
1983-84	18.1	17.3	17.3	21.0	18.5

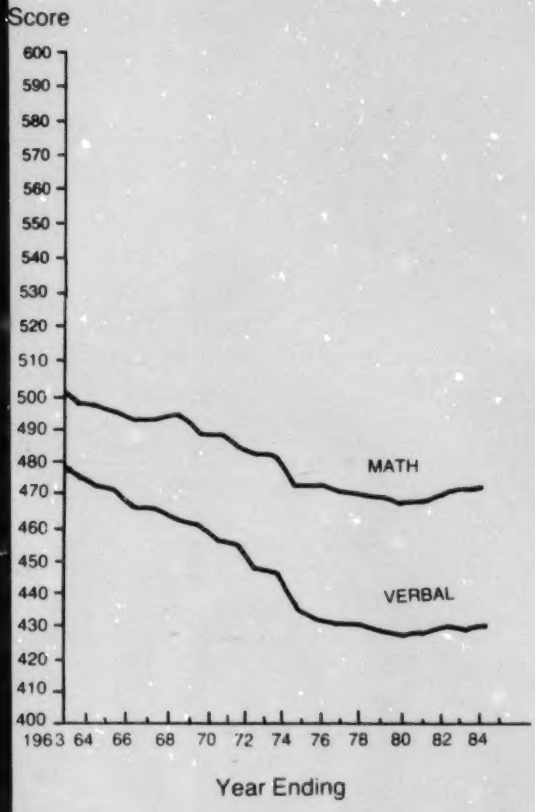
Source: The American College Testing Program

SAT Test Scores: 1963 to 1984

Year	Verbal	Mathematics	Composite
1963	478	502	980
1964	475	498	973
1965	473	496	969
1966	471	496	967
1967	466	492	958
1968	466	492	958
1969	463	493	956
1970	460	488	948
1971	455	488	943
1972	453	484	937
1973	445	481	926
1974	444	480	924
1975	434	472	906
1976	431	472	903
1977	429	470	899
1978	429	468	897
1979	427	467	894
1980	424	466	890
1981	424	466	890
1982	426	467	893
1983	425	468	893
1984	426	471	897

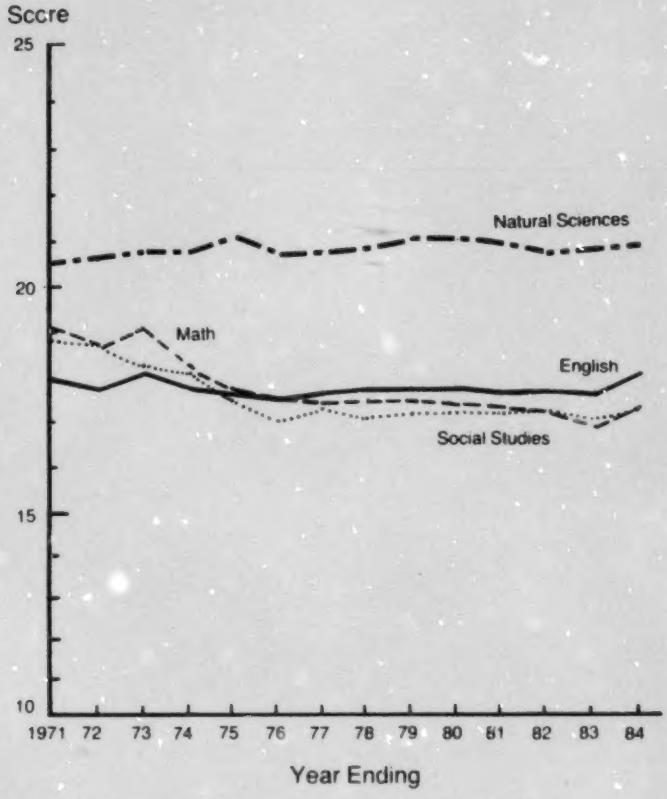
Source: The College Board

SAT Test Scoros, 1963 - 1984



Source: Admissions Testing Program of the College Board

ACT Scores, 1971 - 1984



Source: American College Testing Program

- National average scores of college-bound high school seniors on the Act and SAT declined over the past two decades, but have leveled off or are rising now. The composite ACT score dropped from 19.2 in 1971 to 18.3 in 1975 (or 5 percent) while the total SAT score dropped from 980 in 1963 to 890 in 1980 (or 9 percent).
- The composite ACT score (Table p. 4) has been about level since 1975 while SAT totals have risen slightly from 890 in 1980 to 897 in 1984.

STUDENT PERFORMANCE

In addition to examining U.S national trends in test scores, student performance in the U.S. can be assessed against that of students in other nations. Because educational progress is related to the economic success of individuals as well as to the economic progress of the United States, monitoring U.S. scores relevant to those of other countries is important.

The following international comparisons are from the Second International Mathematics Study organized by the International Association for Evaluation of Educational Achievement (IEA). The study is a nationally representative survey of classrooms conducted during the 1981-82 school year in 18 countries. Mathematics classes in other countries were selected to be equivalent to U.S. eighth grade and advanced twelfth grade mathematics.

Twelfth grade college preparatory classes are provided to about the same proportion of students in the United States as is the overall average among other countries. About 12 percent of all 17 year olds were taking college preparatory classes in the United States. Of the 14 countries for which it was possible to estimate the proportion of the population engaged in advanced secondary school mathematics classes:

- 3 countries had 6 to 10 percent of the age group enrolled
- 5 had about the same percent as the U.S.
- 6 had enrollments from 15 to 50 percent of the age group.

Eighth Grade Mathematics Achievement

	Mean Percent Correct		
	U.S.	Eighteen Countries*	
Topic		Low Quartile	Median
Arithmetic	51	45	51
Algebra	43	39	43
Geometry	38	38	43
Statistics	57	52	57
Measurement	42	47	51

Twelfth Grade College Preparatory Mathematics Achievement

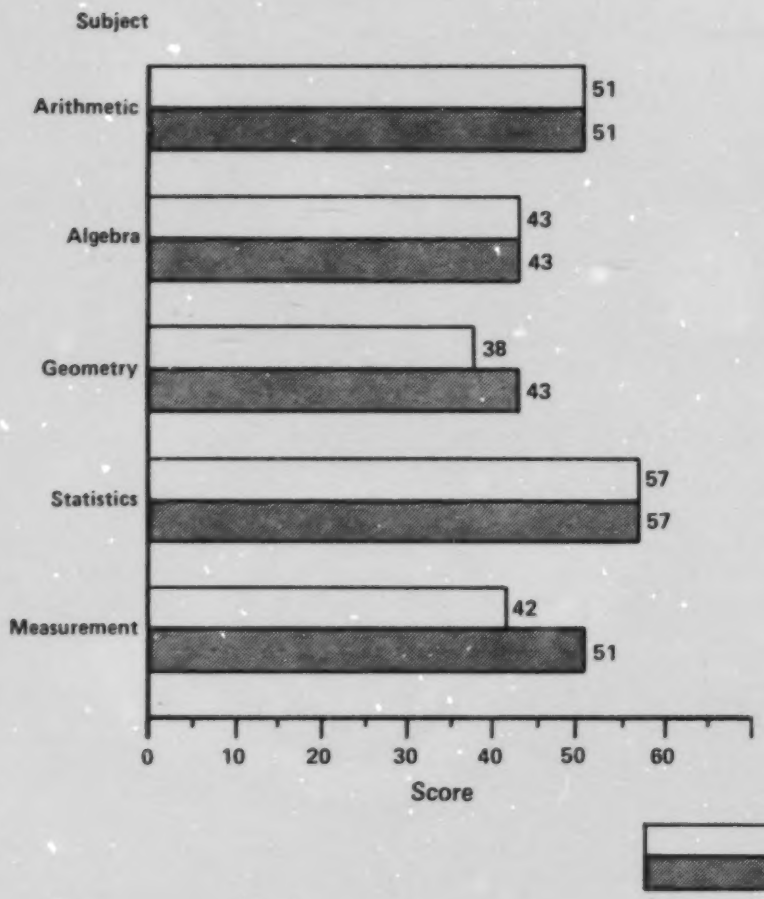
	Mean Percent Correct		
	U.S.	Eighteen Countries*	
Topic		Low Quartile	Median
Sets, Relations	56	51	62
Number Systems	40	40	50
Algebra	43	47	57
Geometry	31	33	42
Functions, Calculus	29	28	44
Statistics	40	38	50
Finite Math	31	n. a.	44

Source: Second International Mathematics Study
Interim Summary Report for the United States
(April 1984)

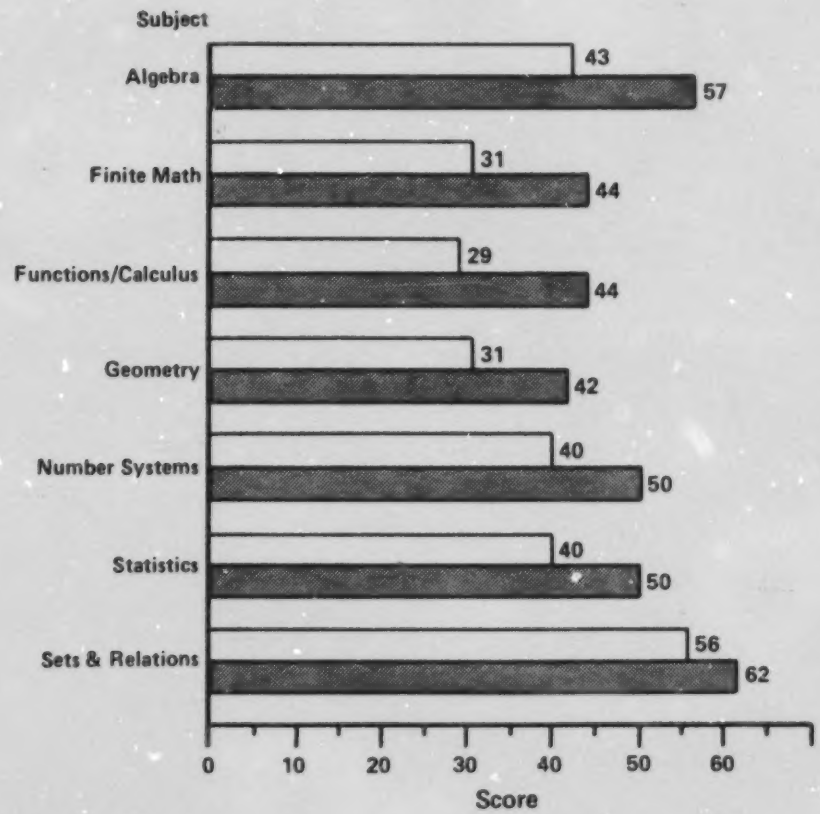
* Median score of 18 countries: Belgium (Flemish and French), Canada (British Columbia and Ontario), England, Finland, Hong Kong, Hungary, Israel, Japan, Luxembourg, Netherlands, New Zealand, Nigeria, Scotland, Swaziland, Sweden, Thailand, and the United States.

(n.a.) not available.

Eighth Grade Mathematics Achievement: The U.S. In International Comparison (1981)



Twelfth Grade Mathematics Achievement: The U.S. In International Comparison (1981)



Source: Second International Mathematics Study Interim Summary Report for the United States (April 1984)

- U.S. twelfth grade mathematics achievement is lower than the average achievement of 18 developed and developing countries, except among the fewer than 10 percent of U.S. students who take calculus. At the eighth grade level, U.S. mathematics achievement is about average in most topic areas.

Another way of examining the outcomes of our educational system is to monitor the subjects students are taking. The following data drawn from the NCES High School and Beyond Survey, display the average number of years that 1982 high school graduates had spent in certain subject areas expressed in "Carnegie Units" (a Carnegie Unit equals one course unit taken for one year).

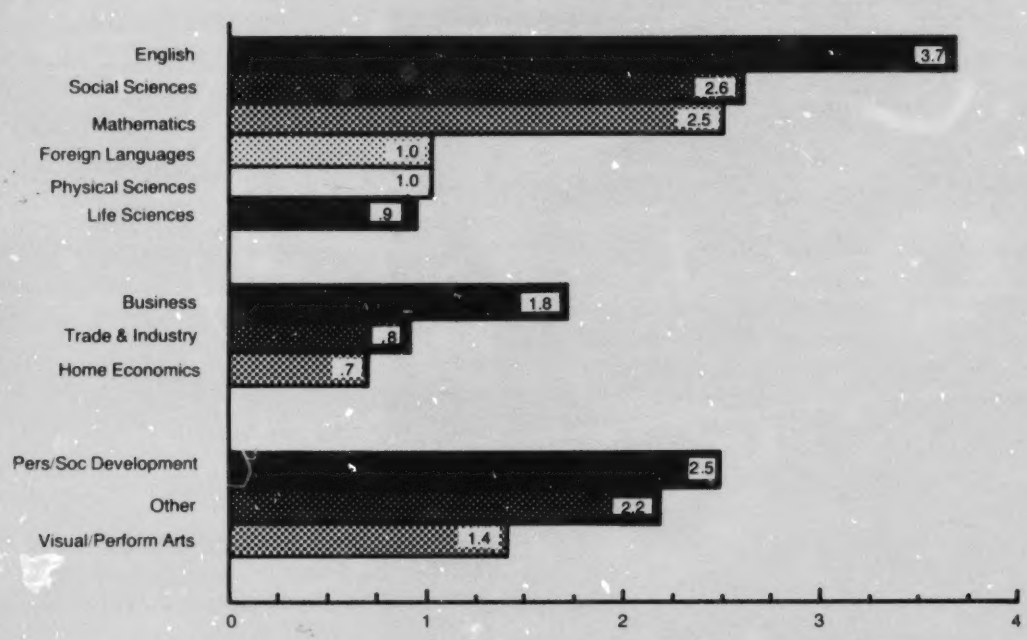
Some analysts would describe course completions as an education "process" rather than as a student outcome. In this regard, it might be a "leading indicator" (like "leading indicators" in the economy), foretelling student attainment that would appear in subsequent student tests. A caveat is that while these data display the credits earned by students, they do not account for varying course content across the nation or for the varying rigor of the subject areas.

MEAN NUMBER OF CARNEGIE UNITS EARNED BY SELECTED SUBJECT MATTER AREA

SUBJECT	MEAN TOTAL
TOTAL	21.1
English	3.7
Mathematics	2.5
Social Science	2.6
Physical Science	1.0
Biology	0.9
Foreign Language	1.0
Business	1.8
Trade & Industry	0.8
Home Economics	0.7
Arts	1.4
Personal	2.5
Other	2.2

Source: High School and Beyond

Average High School Credits Earned By Subject



Source: High School & Beyond Survey, 1982

- On the average, for all high school students, courses elected in "basic subjects" (English, mathematics, social and natural sciences) account for one-half the total course units (10.7 out of 21.1 units).
- These course elections fall short of recommendations made in recent reports on needed improvements in education. For example, the National Commission on Excellence in Education called for 13 units in these subjects (plus 1/2 unit in computer science for all students and 2 years of foreign language for students planning to attend college).

In examining the outcomes of our schools, one important measure is how many students are able to complete the educational process. If students do not complete high school, then it is doubtful that they have obtained the full set of skills and abilities that many citizens believe necessary to function productively.

Thus, an important outcome measure of education is the extent to which students complete high school graduation requirements with classmates of roughly the same age. The data in the table reflect the percentages of students who have successfully completed the 12th grade at an age, 18 and 19 years old, when the public expects students to complete the system.

A large number of students are still in high school at ages beyond 18 and 19 and will not graduate or receive a General Equivalency Diploma (GED) certificate until they are older. For example, in 1983 the percent of 24-year olds who had completed high school graduation requirements or received a GED is 85.0 percent compared with 72.7 percent for 18 and 19-year olds.

The data here have been calculated using information from the Bureau of the Census Current Population Surveys. The source of the data is household interviews and the data include the number completing 12 or more years of either public or private schooling or having obtained a General Equivalency Diploma (GED).

High School Graduates: Percent of 18- and 19-year-olds who have graduated from high school, by race/ethnicity

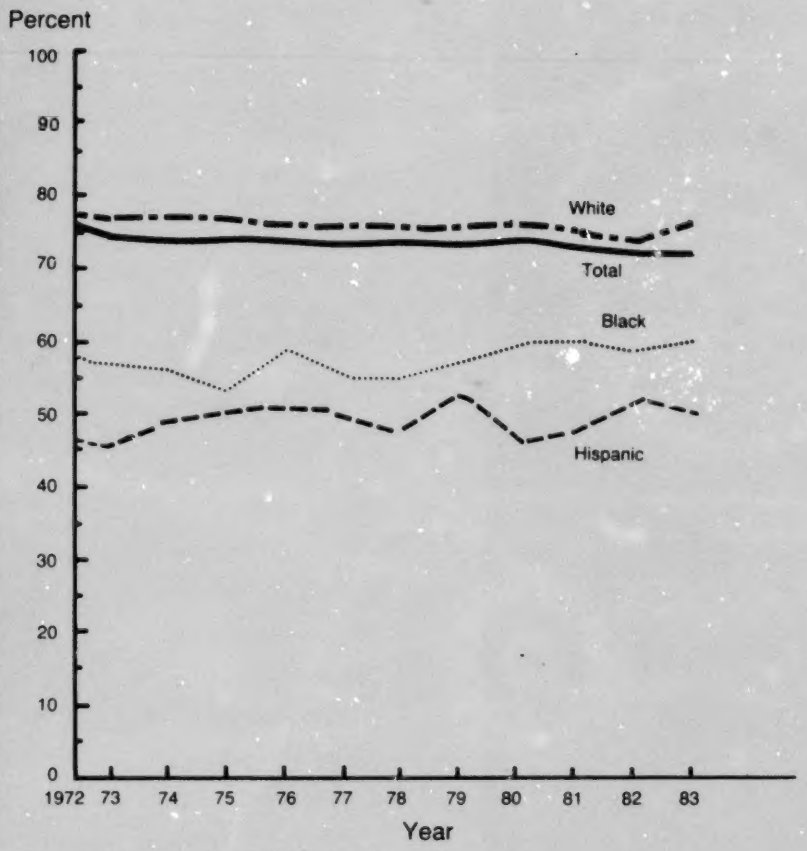
	Total	White	Black	Hispanic
1967	71.2	73.9	51.4	n.a.
1968	72.0	74.7	52.2	n.a.
1969	73.7	77.0	51.5	n.a.
1970	73.4	76.6	51.7	n.a.
1971	73.2	76.4	51.7	n.a.
1972	74.8	77.6	57.2	46.3
1973	73.9	76.7	56.4	45.2
1974	73.4	76.2	55.8	48.9
1975	73.7	77.0	52.8	50.0
1976	73.1	75.4	58.2	50.9
1977	72.9	75.7	54.9	50.7
1978	73.5	76.3	54.9	48.9
1979	72.8	75.3	56.4	53.7
1980	73.7	76.1	59.3	46.1
1981	72.5	74.8	59.6	47.2
1982	72.0	74.5	58.2	51.7
1983	72.7	75.6	59.1	50.3

U.S. Department of Commerce, Bureau of the Census, Current Population Reports, Population Characteristics, Series P-20, School Enrollment--Social and Economic Characteristics of Students: October, (by Year).

(n.a.) not available.

Percent High School Graduates by Race/Ethnicity: 1972 to 1983

(Percent of 18 and 19 Year Olds Completing 12 Years of Education; totals include GEDs)



Source: Bureau of the Census Current Population Reports

- **The proportion of 18- and 19-year olds who have graduated from high school declined from a peak of 74.8 percent in 1972 to 72.0 percent in 1982.**
- **The percentages of high school graduates for Blacks and Hispanics are several points below Whites for each year, but are slightly higher in 1982 than in 1972.**

Experience in the schools is one factor affecting the choices students make about their post-high school activities.

Data from NCES longitudinal studies permit comparison of immediate post-high school experience of seniors who graduated in 1972 and 1980.

What students actually do after leaving high school is not a direct measure of the adequacy of the students' preparation to assume certain roles in the society. It can serve, however, as a guide to help school planners compare these national trends with local or State trends and to adjust instructional programs to better meet students' needs.

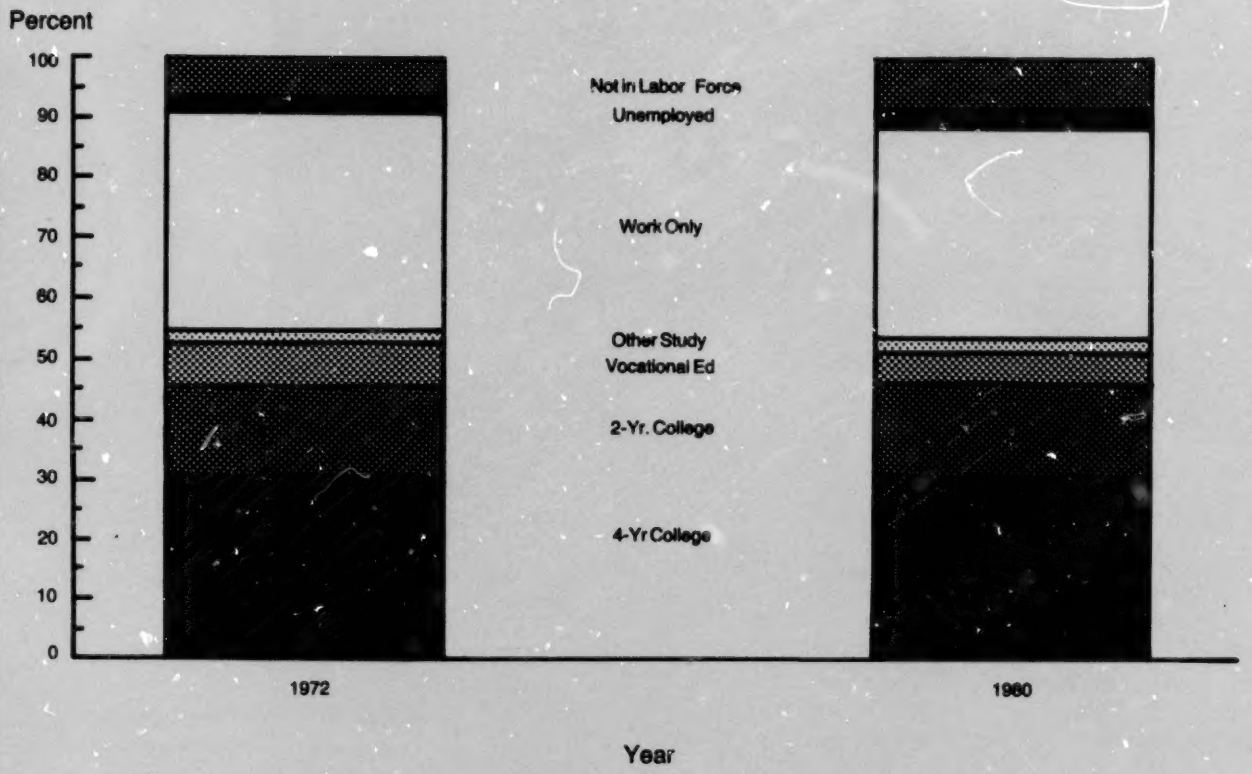
Percentages of 1972 and 1980 Seniors in Indicated Activity in the October Following Graduation

Activity in October Following Graduation	1972 Seniors	1980 Seniors
Enrolled in 4-year college, no work	21.2	14.9
Enrolled in 4-year college, plus work	8.9	15.6
Enrolled in 2-year college, no work	6.4	5.1
Enrolled in 2-year college, plus work	8.6	10.3
Enrolled in vocational-technical school, no work	4.1	2.0
Enrolled in vocational-technical school, plus work	3.5	3.1
Other Study	2.1	2.3
Work full-time, no study	30.4	25.0
Work part-time, no study	5.5	9.4
Military Services only	.8	---
Homemaker full-time	2.4	---
Looking for work	2.9	---
Other	3.0	---
Unemployed	---	4.6
Not in labor force	---	7.6

Note: The last six categories are not directly comparable for the 1972 and the 1980 data.

(- - -) not applicable.

Activities of High School Seniors in October of the Year After Graduation: 1972 and 1980



Source: 1973 Follow-up of the National Longitudinal Survey of the Class of 1972, and 1982 Follow-up of the Senior Cohort of High School and Beyond, 1980

- There appears to be little change in the post high school activities of seniors although more detailed information indicates a higher percentage of those attending college are working.

One measure of the effectivness of the American high school is the percentage of students enrolled in remedial courses in college. This percentage is actually a function of many variables, including the adequacy of high school preparation, student aptitude, student choice of college, the level of college entrance standards and the rigor of entry level courses, and the availability of remedial courses. Such variables should be considered when evaluating trends over time.

The first table presents information on the growth of remedial enrollment between 1978 and 1984 in the approximately 2300 higher education institutions offering remedial courses in 1984. The second table presents baseline data on the percentage of all freshmen who are enrolled in remedial reading, writing, and math. The percentages are based on all higher education institutions with first year programs, approximately 2800 in the nation as a whole.

Change In Remedial Course Enrollment From 1978-1984 In Institutions of Higher Education

	Remedial Enrollment Decreased			Remedial Enrollment Stayed About The Same	Remedial Enrollment Increased		
	More Than 50%	30 to 50%	10 to 30%		10 to 30%	30 to 50%	More Than 50%
*Percent of institutions (total = 100%)	Less than 1	Less than 1	4	33	44	9	10

Source: Fast Response Survey System.

* Each sample instituion offering remedial courses in 1984 checked the category that best described its change in remedial enrollment from 1978-1984. These responses have been cumulated and expressed as percentages.

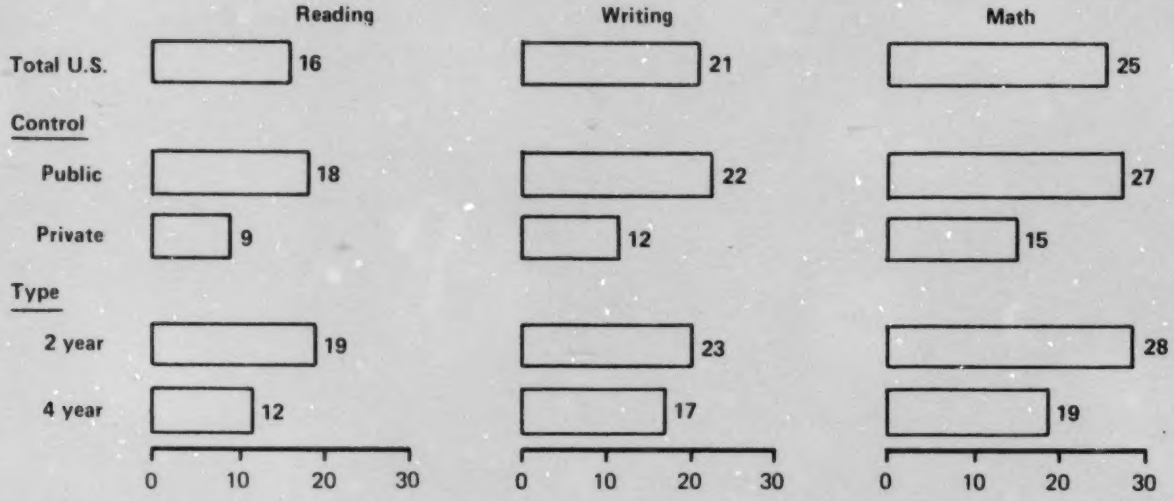
Percentages of Freshmen Enrolled in Remedial Courses In Institutions of Higher Education, by Subject: 1983-84

Institutional Characteristics	Subject		
	Reading	Writing	Math
Total U.S.	16	21	25
Control			
Public	18	22	27
Private	9	12	15
Type			
2-Year	19	23	28
4-Year	12	17	19
Region			
Southeast	20	23	31
West and Southwest	19	23	27
North Atlantic	15	20	19
Great Lakes and Plains	11	17	24
Admissions Criteria*			
Open	20	24	30
Liberal	14	17	19
Traditional	9	13	13
Selective	6	14	13

Source: NCES Fast Response Survey System.

* Definitions and classification are based on the Chronicle Four-Year College Databook and Chronicle Two-Year College Databook published by Chronicle Guidance Publications, Inc. (1984)

Percentage of Freshmen Enrolled in Remedial Courses in Institutions of Higher Education by Subject: 1983-84



Source: Fast Response Survey System.

- Sixteen percent of college freshmen are enrolled in remedial reading, 21 percent are in remedial writing, and 25 percent are in remedial math. These percentages vary by control, type, geographic region, and selectivity of the college.
- 82 percent of higher education institutions with first-year programs offered remedial courses in reading, writing, or math in 1984. Of these, 63 percent had remedial enrollment increases of 10 percent or more, 33 percent had relatively stable remedial enrollment, and only 4 percent had decreases of 10 percent or more.

One goal that educators and citizens both expect from our schools is to foster and encourage a sense of citizenship in our students. One possible measure of this sense of citizenship is participation rates in elections. These data, drawn from the Bureau of the Census Current Population Surveys, show the declining percentage of 18- to 24-year-olds who voted in Presidential elections.

Percent of 18- to 24-year-olds reported having voted

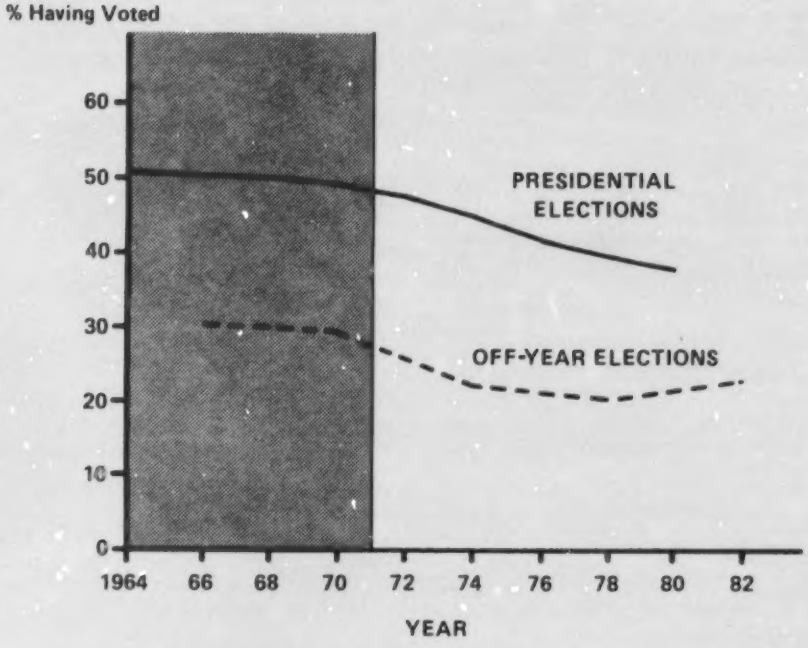
Presidential Elections:				Off-Year Elections:			
Year	18-24	18-20	21-24	Year	18-24	18-20	21-24
1964	50.9	n.a.	51.3	1966	31.1	n.a.	31.7
1968	50.4	n.a.	51.1	1970	30.4	n.a.	30.4
1972	49.6	48.3	50.7	1974	23.8	20.8	26.4
1976	42.2	38.0	45.6	1978	23.5	20.1	26.2
1980	39.9	35.7	43.1	1982	24.8	19.8	28.4

Source: U.S. Bureau of the Census, Current Population Reports, Series P-20.

Note: Beginning in 1972, persons 18- to 20-years-old in all States were allowed to vote for the first time. See note on next page.

(n.a.) indicates not available.

Percent of 18 to 24 Year Olds Reported Having Voted, 1964-1982



NOTE: The shaded area is the period prior to passage of the constitutional amendment which lowered the national voting age to 18. From 1964 to 1970, the minimum voting age was 21 in 46 states and the District of Columbia, 20 in Hawaii, 19 in Alaska, and 18 in Georgia and Kentucky. Thus, for the 1964-1970 period, the graph shows the proportion of 18 – 24-year-old voters from among those who were eligible under varying State laws.

•Of 18 to 24 year olds, the age group most likely to have just completed high school, the percent participating in elections has dropped over the past decade by about 20%.

RESOURCES

Although direct causal relationships cannot always be made between expenditures and student achievement, the predominant view of educators and analysts is that expenditure data is an important indicator of the condition of our nation's public schools. Expenditures can be directly altered through policy decisions made by elected officials, administrators, and the public. Moreover, expenditure data are used as factors in the distribution of grants to schools, and such data are a tangible measure of commitment to education.

The data presented here display the national trend in per pupil expenditure since 1969-70 in terms of both current and constant 1982-83 dollars. This commonly reported measure is arrived at by dividing total school expenditures by the number of students. The measure is not without problems, however, because of differing definitions used in various States for counting both expenditures and students.

See Appendix page A-7 for detailed data by State for 1970-71 and 1982-83 in constant and current dollars.

Current expenditures per pupil, 1969-70 to 1982-83[a]

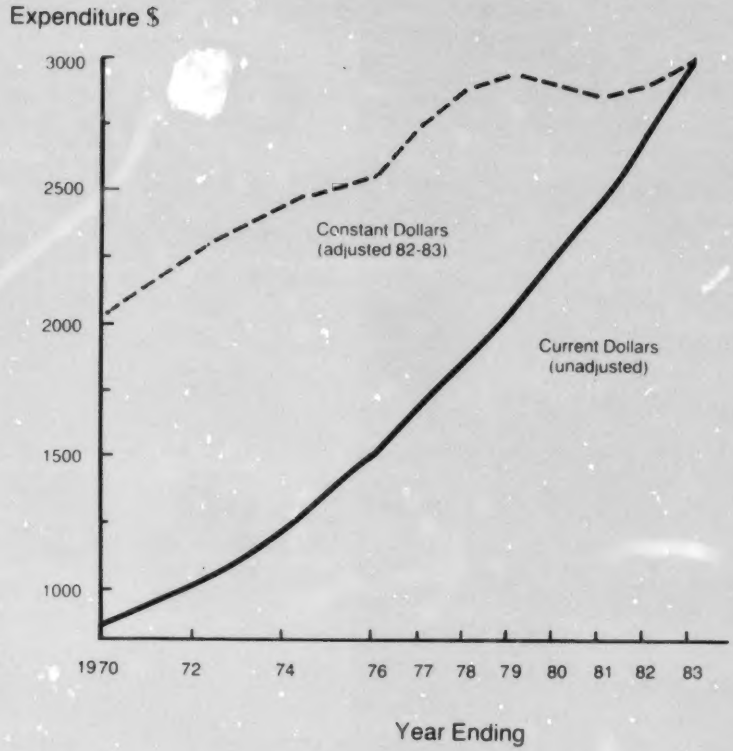
School Year	Current Dollars (unadjusted)	Constant Dollars (adjusted to 1982-83 purchasing power[b])
1969-70	816	2,121
1971-72	990	2,362
1973-74	1,207	2,540
1975-76	1,504	2,662
1976-77	1,638	2,740
1977-78	1,823	2,857
1978-79	2,021	2,896
1979-80	2,272	2,873
1980-81	2,493	2,826
1981-82	2,731	2,848
1982-83	2,948	2,948

[a]Includes day school expenditures only; excludes current expenditures for other programs. Based on pupils in average daily attendance in public elementary and secondary schools.

[b]Based on Consumer Price Index, Prepared by the Bureau of Labor Statistics.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Statistics of State School Systems; Revenues and Expenditures for Public Elementary and Secondary Education and unpublished data.

Current Expenditure Per Pupil, 1969-70 to 1982-83



Source: NCES, Statistics of State School Systems

- Current expenditure per pupil has increased steadily from 1969-70 ($816) to 1982-83 ($2,731). Much of this increase can be explained by inflation. In constant 1982-83 dollars, the increase is roughly from $2,000 to $2,900. Between 1978 and 1981, current expenditure per pupil showed a slight decline in real terms.

FISCAL RESOURCES

Another way of measuring fiscal commitment to education is to construct some composite index of funds available for education as a portion of the wealth of the nation. Developing such a measure as an indicator is not easy since there is no generally agreed upon measure of either school revenue or wealth. It is not untried though; educators, economists, and statisticians frequently cite the ratio of education spending to GNP as an indicator of a national level of investment and plot the trend of that measure over time.

The formula used in calculating the index presented here takes into account the proportion of each State's population that is enrolled in public schools. It measures the amount of school revenues in relation to personal income, but weights personal income to recognize that students are but one of many legitimate constituencies with claim on a State's tax base.

See Appendix pages A-8 to 10 for effort measures by State for this index.
Each State's index includes only State and local revenues.

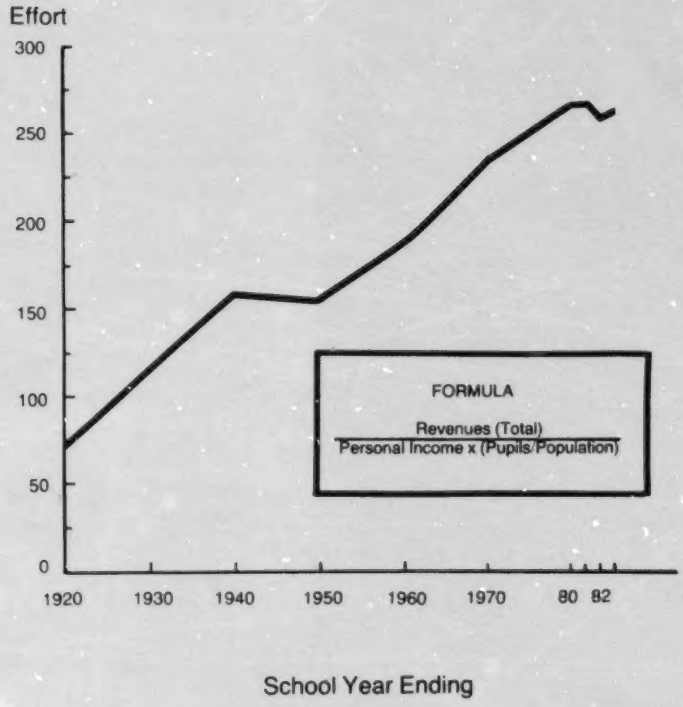
Federal, State, and Local Fiscal Effort for Public Elementary and Secondary Schools: United States 1920 to 1983

School Year	Education Revenues in Thousands of Dollars			Personal Income	Population	Public E&S Enrollment
	State	Local	Federal	(billions)	(thousands)	(thousands)
1919-20	$ 160,085	$ 807,561	$ 2,475	$ 65.0	104,512	21,578
1929-30	353,670	1,727,553	7,334	85.9	121,770	25,678
1939-40	684,354	1,536,363	39,810	72.8	130,880	25,434
1949-50	2,165,689	3,115,507	155,848	207.2	149,300	25,111
1959-60	5,768,047	8,326,932	651,639	383.5	177,100	36,087
1969-70	16,062,776	20,984,589	3,219,557	750.9	201,385	45,619
1979-80	45,348,814	42,028,813	9,503,537	1,942.6	224,569	41,645
1980-81	50,182,659	45,998,166	9,768,262	2,156.7	227,236	40,987
1981-82	52,436,435	49,469,751	8,186,466	2,420.0	229,518	40,099
1982-83	56,450,781*	52,122,919*	8,338,804	2,575.8	231,786	39,643

* Preliminary as of 7/31/84
Note: Data Beginning in 1959-60 includes Alaska and Hawaii

Sources: Revenues: NCES, Personal Income, Bureau of Economic Analysis and Bureau of the Census, Population: Bureau of the Census, Public E&S Enrollment: NCES.

Fiscal Effort For Public Elementary And Secondary Schools, 1920 to 1983



Sources: National Center for Education Statistics and Bureau of Economic Analysis

• The trend demonstrates an overal' increase in the fiscal effort for the nation's schools with a drop in effort during the period of World War II and a slowing growth rate since 1980.

Perhaps the most critical resources in our schools are our teachers. The indicator here examines how many teachers we are supporting to instruct the number of students enrolled. The data and chart for this indicator report:

- pupil/teacher ratio, reflecting all enrolled pupils and total "full-time equivalent" teacher staffs for the nation as a whole

- class size, reflecting reports from classroom teachers themselves about the number of students in their classrooms.

The pupil/teacher ratio would include instructional staff that do not have regular classroom assignments such as art and music teachers, or teachers of the handicapped.

In terms of workload it is argued by teachers that the number of students reporting to a given teacher should be limited. The research literature supports the link between student achievement and reduced class size but there are caveats. Major improvements occurred only in classes of 15 and below; further, small classes do not always mean greater achievement, reinforcing the critical importance of high quality instruction no matter what the class size.

Recent research indicates the quality of classroom management may be as crucial to student achievement as classroom size. An equally appropriate question to ask, then, is how best to manage a class of any size so that optimum learning takes place. At this point, appropriate measures of classroom management are not available to include in Indicators.

Pupil/Teacher Ratio —
Public Elementary and Secondary Schools
1959-60 to 1983-84

Year	Elementary	Secondary	Total
1959-60	28.7	21.5	26.0
1961-62	28.3	21.7	25.6
1963-64	28.4	21.5	25.5
1965-66	27.6	20.8	24.7
1967-68	26.3	20.3	23.7
1969-70	24.8	20.0	22.7
1971-72	24.9	19.3	22.3
1973-74	22.9	19.3	21.3
1975-76	21.7	18.8	20.4
1977-78	21.1	18.2	19.8
1979-80	20.9	16.8	19.0
1980-81	20.5	17.1	19.0
1981-82	20.6	16.9	18.9
1982-83	20.4	16.6	18.7
1983-84	20.1	16.5	18.5

Note: In 1971 and subsequent years, the data by level are estimated.

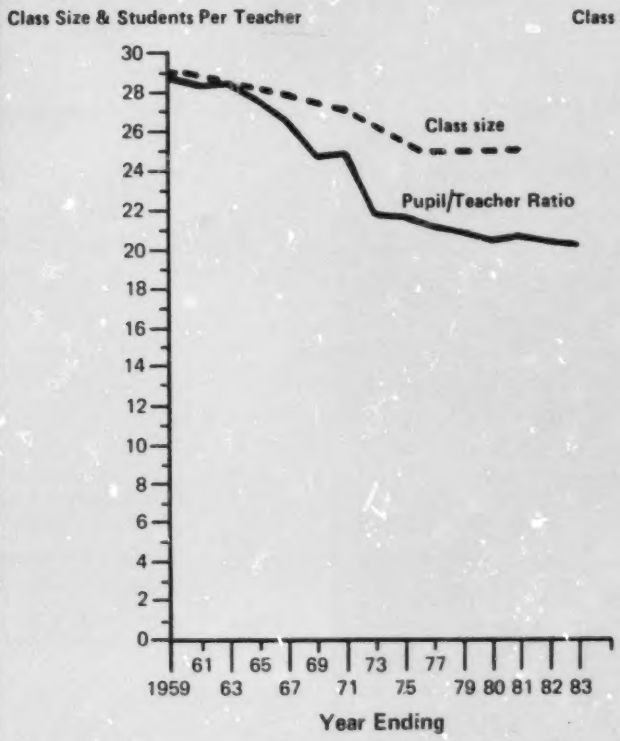
Source: U.S. Department of Education, National Center for Education Statistics, Statistics of Public Elementary and Secondary School Systems and NCES unpublished data and estimates.

Class Size — Public Elementary and Secondary Schools,
1960-61 to 1980-81

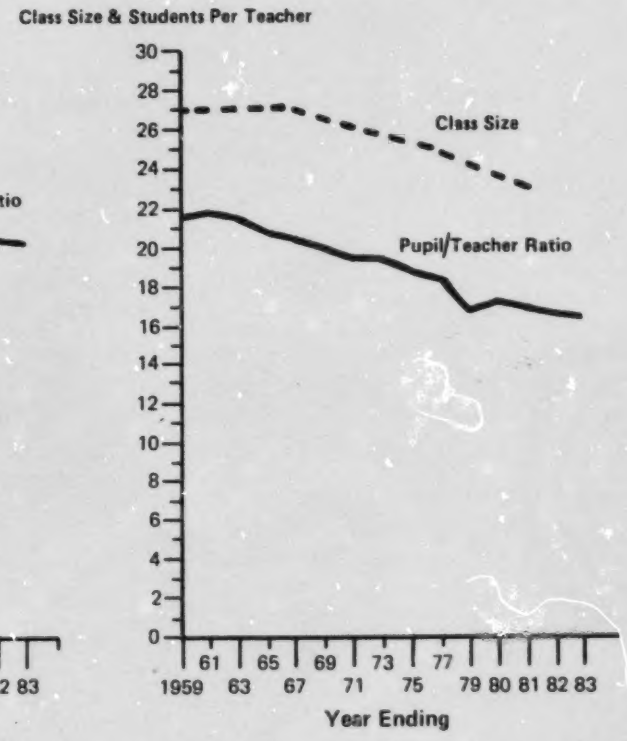
Level	1960-61	1965-66	1970-71	1975-76	1980-81
Elementary	29	28	27	25	25
Secondary	27	27	26	25	23

Source: NEA, Status of the American Public School Teacher, 1980-81.

Public Elementary School Pupil/Teacher Ratio And Class Size



Public Secondary School Pupil/Teacher Ratio And Class Size



Sources: NCES, Statistics of Public Elementary and Secondary School Systems and NEA, Status of the American Public School Teacher.

Two measures of the relationship of pupils and teachers are:

- Class size, as reported by teacher polls, has declined steadily over the years 1960-61 to 1980-81 in the public schools

  from 29 to 25 at the elementary level and
  from 27 to 23 at the secondary level

- The pupil/teacher ratio has dropped over the years 1959-60 to 1983-84 in the public schools

  from 28.7 to 20.1 at the elementary level and
  from 21.5 to 16.5 at the secondary level

It is generally recognized that to be successful, the current reform movement in education must give proper attention to the teachers.

Educational attainment of the American teaching force is high. But it alone cannot be equated with professional competence; there is too much variability in the coursework and in the quality of the institutions providing the advanced degrees to draw neat conclusions about teaching quality based solely on years of study or degrees held.

An index that can be examined with some confidence, however, is that of performance on national tests. Research shows a high correlation between verbal ability of teachers and achievement of their students. Hence, the indicator shown here portrays the verbal ability of recent college graduates in terms of major and careers as teachers.

Lacking in these data, is direct evidence of competence. Indeed, the professional debate is on how best to measure it.

THE DISTRIBUTION OF ACADEMIC ABILITY IN THE TEACHING FORCE

Measured Verbal Ability on the Scholastic Aptitude Test
Comparing Those In and Out of the Teaching Profession
(Data from 1979 Sample of the High School Class of 1972 Who Completed College)

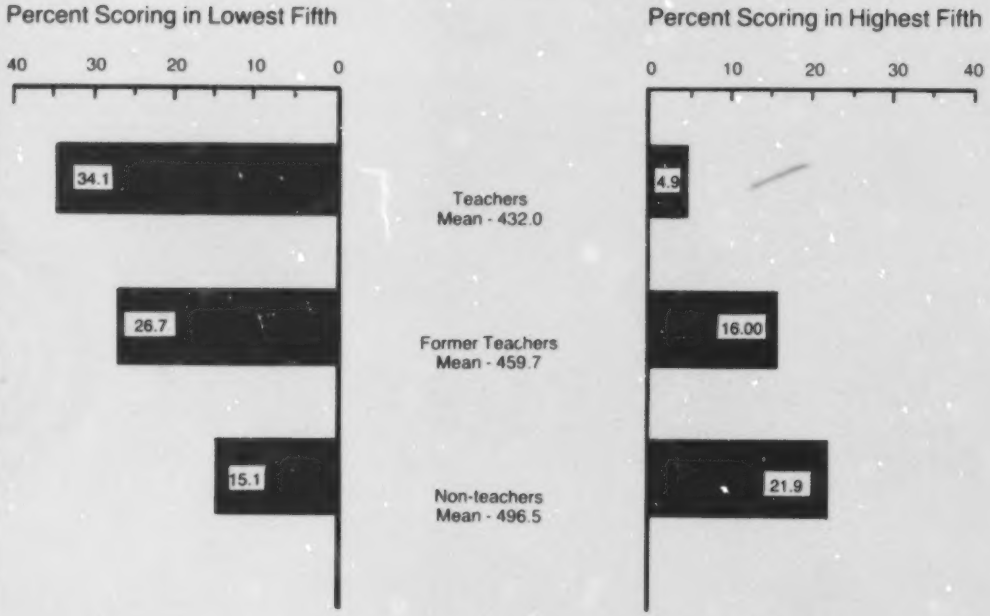
Rank Order of SAT Score	Non-Recruits Did not major in Education and never taught	Ex-Teachers Those not planning to return to teaching	Committed Teachers Recruits who intend to teach at age 30
Highest Rank*			
Number:	437	12	11
Percent:	21.9	16.0	4.9
Lowest Rank			
Number:	300	20	77
Percent:	15.1	26.7	34.1

*The sample was broken into 5 ranks based on SAT score.

Source: Analysis of the NCES *National Longitudinal Study (NCES-72)* by Victor S. Vance and Phillip L. Schlechty.

Verbal Ability Of Teachers, Former Teachers, And Non-Teachers

(Sample of high school graduates of 1972 who graduated from college.)



Source: 1981 Data Analysis by Schlechty and Vance of the 1979 NCES follow-up on the National Longitudinal Study of the Class of 1972 (NLS-72)

- For college graduates who had taken the SAT in high school, those most likely to enter and remain in the teaching force are drawn from those who most often score lower on the Scholastic Aptitude Test.

Whether or not there will be a sufficient supply of teachers in the future is a current concern. With student enrollment increases projected, the low number of new teacher graduates together with expected retirements suggest the real possibility of a teacher shortage in the near future. This shortage could undermine current attempts to upgrade the quality of teachers in the schools.

A recent survey by NCES indicates that the number of cases in which a school system is unable to fill a vacant position is very few. (See appendix table on page A-11). For this survey, "shortage" was defined as a position "vacant, abolished or transferred to another field...because a candidate was unable to be found." In many cases, vacancies are filled by teachers from overstaffed fields who have received in-service training enabling them to qualify to teach in a "shortage" area.

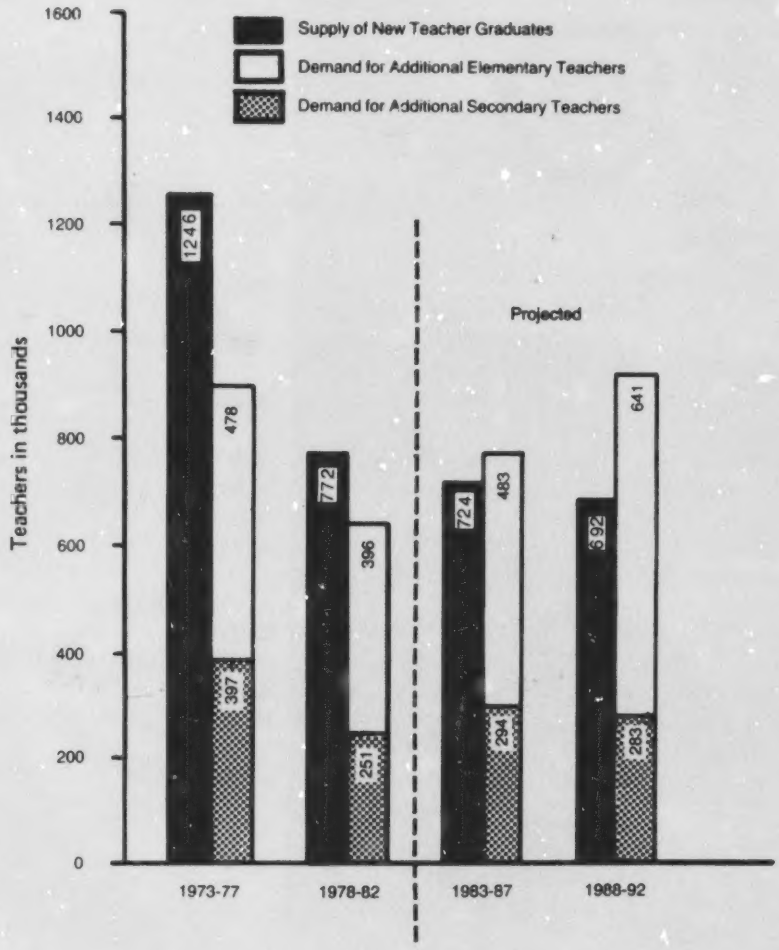
However, when the situation is portrayed only in terms of numbers, changes in quality may be hidden. To plan accurately for the future, it would be prudent, as noted authorities have counseled, for each school district to conduct its own survey and to couple it with a teacher evaluation system. Together, these assessments would reflect the true nature of each locality's recruitment and training needs.

Trends in Estimated Demand for Classroom Teachers in Elementary/Secondary Schools and Estimated Supply of New Teacher Graduates: Fall 1970 to Fall 1992

Fall of Year	Estimated Demand for Additional Teachers		Estimated Supply New Teacher Graduates
	Elementary	Secondary	
1970	115	93	284
1971	71	92	314
1972	187	72	317
1973	89	86	313
1974	103	80	279
1975	181	85	238
1976	78	72	222
1977	187	74	194
1973-77	478	397	1,246
1978	82	56	181
1979	84	44	163
1980	69	58	144
1981	66	44	141
1982	94	49	143
1978-82	396	251	772
	Projected		
1983	82	66	146
1984	78	64	146
1985	95	62	146
1986	114	56	144
1987	114	46	142
1983-87	483	294	724
1988	126	38	139
1989	126	47	139
1990	131	52	139
1991	129	66	138
1992	129	80	137
1980-82	541	283	692

Source: U.S. Department of Education, National Center for Education Statistics, Projections of Education Statistics to 1992-93, forthcoming; and national Education Association, Teacher Supply and Demand in Public Schools, 1980-81, 1981, copyrighted.

Estimated Teacher Supply and Estimated Demand for Additional Teachers



Source: NCES, The Condition of Education, 1984

- Beginning in the mid-1980's, the demand for additional teachers is projected to exceed the supply of new teacher graduates. Elementary schools should provide two-thirds of this demand.

The issue of teacher quality demands serious consideration of compensation as a key element in attracting and holding more able teachers. This table presents teacher earnings (both salaries and compensation from other activities) in the context of earnings by others. Comparisons are made over a two-decade interval between the earnings of teachers and (a) other professionals as well as (b) workers whose jobs do not require a college degree. Distinctions are made between males and females in all fields since their earnings are significantly different.

Such data have limitations. For example, salaries shown are 12-month earnings and it is not known to what extent earnings by teachers (who normally work under 10-month contracts) have been augmented by earnings from part-time jobs.

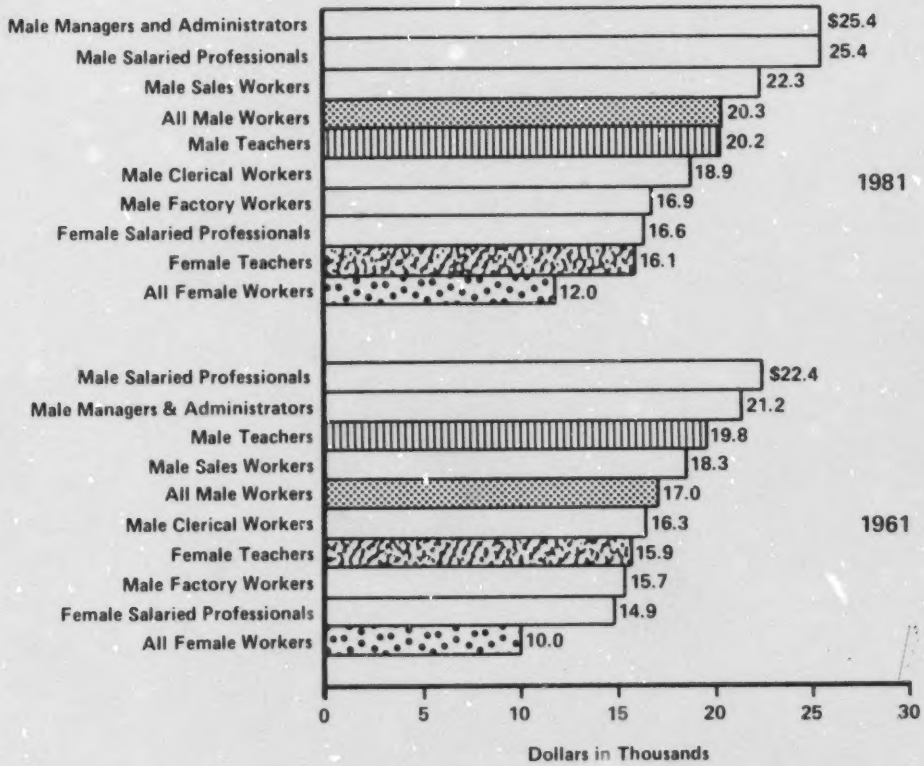
Comparisons of Earnings for Men and Women in Teaching and Other Selected Occupations

Occupation in Longest Job Held During the Year	Men Earnings (1981 dollars)		Women Earnings (1981 dollars)	
	1961	1981	1961	1981
Salaried professionals, Total	22,437	25,350	14,903	16,558
—Accountants	n.a.	24,905	n.a.	15,631
—Health workers (except physicians and dentists)	n.a.	16,631	n.a.	16,827
—Teachers, elementary and secondary schools	19,792	20,249	15,888	16,056
Managers and Administrators	21,211	25,425	10,370	14,820
Sales Workers	18,305	22,331	7,269	11,238
Clerical Workers	16,280	18,938	11,306	11,755
Craft Workers	18,256	20,095	NA	12,904
Factory Workers	15,657	16,948	8,972	10,301
All full-time workers	17,010	20,260	10,078	12,001

(n.a.) not available.

Earnings Of Teachers And Individuals In Other Selected Occupations, By Sex (In Constant 1981 Dollars)

(Full-time workers)



Source: U.S. Bureau of the Census, Current Population Reports.

- Earnings for male teachers exceeded the average for all male full-time workers in 1961 (by 16%) but fell to just below that average for 1981. Male teacher earnings lagged behind those for all male salaried professionals and for managers in 1961 but by 1981 had also fallen behind sales workers.
- Income for female teachers exceeded the average for females in salaried professions, management, sales, clerical, and factory occupations in 1961 and was significantly above the average for all female workers (+58%). By 1981 it had dropped behind women salaried professionals but continued to surpass the other occupations and still exceeded the average for full-time female workers (by 34%).
- Earnings for female teachers were below the average for all male full-time workers in 1961 (.7%) and had dropped further by 1981 (26% below the male full-time worker average).
- Over the 20 year period, average earnings for all full-time male workers increased 19% in real purchasing power, and for all full-time female workers increased 17% while those for male teachers increased 2% and those for female teachers just over 1%.

CONTEXT

PERCEPTIONS OF THE SCHOOLS

The perceptions of the general public about how well the schools are achieving goals society expects of them are important reflections of the status of the educational system. If monitored over time, such information reflects the extent to which trends of the system are understood beyond the schoolhouse and are commonly viewed by educators and the public.

The system of public schools is dependent in a number of direct and indirect ways on public support. It is arguable that data gleaned from opinion polls and attitude surveys actually reflect the absolute performance of the schools since opinions can be molded by a number of external factors, such as media coverage and individual ideas about the goals of schooling. Nonetheless, opinion of the public and of teachers can have a decided effect on decisions of policymakers, fiscal support, quality of services delivered in the classroom, and also on choices parents make about enrolling their children in the school system.

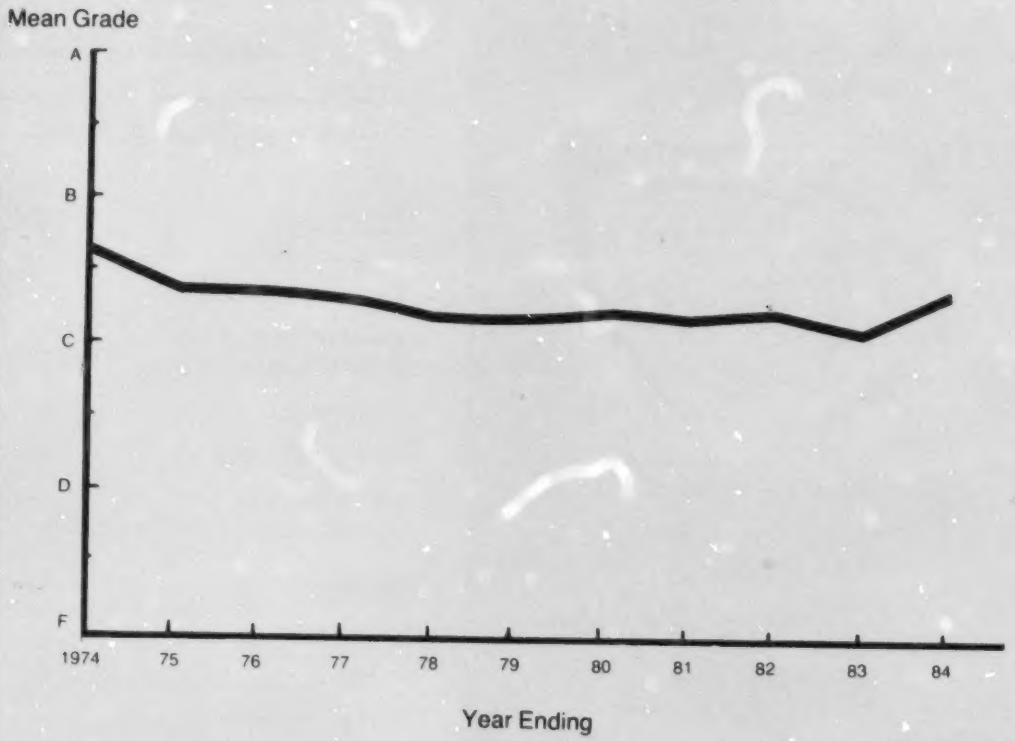
National Public Opinion Ratings Schools: Mean grade that the public would give schools in the local community.

Year	Mean Grade*
1974	2.63
1975	2.38
1976	2.38
1977	2.33
1978	2.21
1979	2.21
1980	2.26
1981	2.20
1982	2.24
1983	2.12
1984	2.36

*(Rating scale A = 4, B = 3, C = 2, D = 1, and F = 0)

Source: The Gallup Poll of the public's attitudes toward education, Phi Delta Kappa.

National Public Opinion Ratings Of Schools
Mean Grade That The Public Would Give Schools In The Local Community



Source: The Gallup Poll of the Public's attitudes toward education. Phi Delta Kappa

- The public attitude regarding the local public schools declined between 1974 and 1983 but turned sharply upward in 1984.

The differing perspectives of those who observe the educational system largely from the outside—parents and the general public—and those who observe it from the inside—teachers—can give guidance to school administrators and policymakers about how best to use resources so that problems can be remedied.

Items Most Frequently Cited As The Biggest Problems of the Local Public Schools, For Years 1970, 1975 and 1980–1984

Problems	Years						
	1970	1975	1980	1981	1982	1983	1984
	%	%.	%	%	%	%	%
Discipline	18	23	26	23	27	25	27
Integration	17	15[1]	10[1]	11[1]	—	—	6
Finances	17	14	10	12	22	13	14
Teachers	12	11	6	11	10	8	14
Faiclities	11	—	—	—	—	—	—
Drugs	11	9	14	15	20	18	18
Size of School/Classes	—	11	7	—	—	—	4
Curriculum/Standards	—	—	11[2]	14[2]	11[2]	14[2]	15
Teachers lack of interest	—	—	—	—	7	8	5

[1]Forced busing for racial integration becomes a focus of concerns in 1975 and following years.

[2]Poor standards were added to curriculum in 1978 and thereafter.

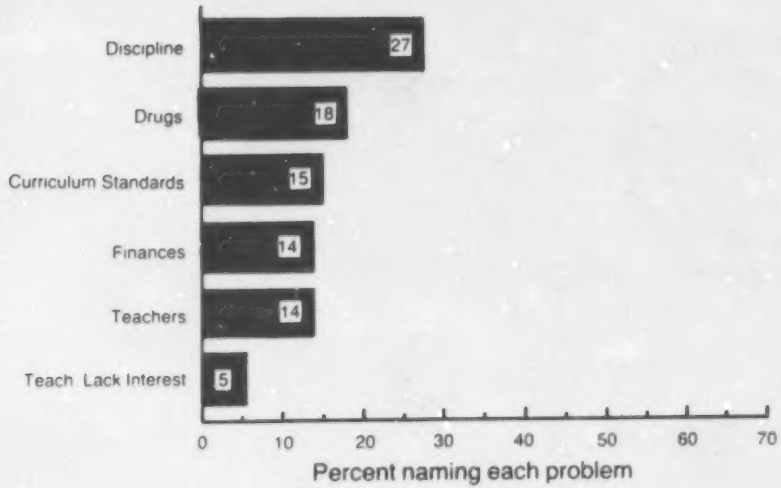
Source: Phi Delta Kappa, The Annual Gallup Poll of the Public Attitudes Toward Public Schools.

Teachers' Views on the Seriousness of Problems in Their Own Schools

Problems	Percent				
	Very Serious	Some-what Serious	Not Very Serious	Not At All Serious	Not Sure
Inadequate Financial Support for the School	21	42	27	10	*
Students' Lack of Interest in Their Classes	19	47	27	7	*
Overcrowded Classes	14	32	30	23	—
Lack of Discipline	8	32	37	22	—
Difficulties in Getting Enough Qualified Teachers	8	23	33	35	*
Drugs	6	27	33	34	*
Elementary	2	13	29	55	*
Junior High	7	39	39	16	—
High School	12	45	36	6	—

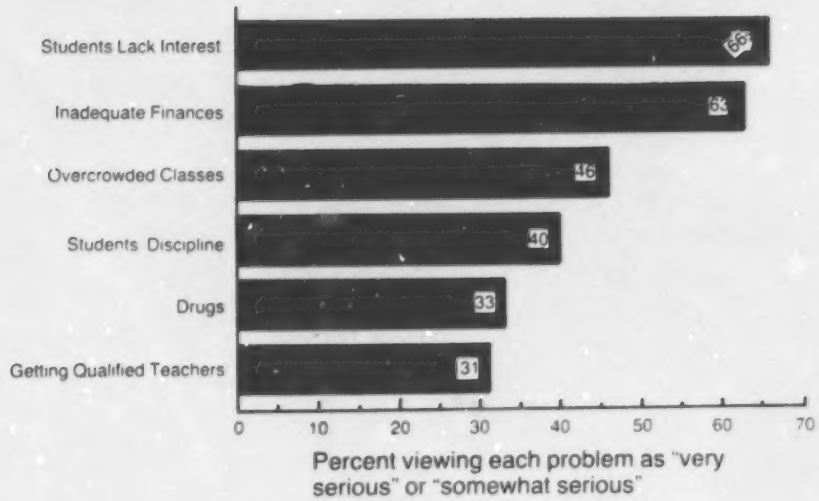
Source: The Metropolitan Life Survey of the American Teacher. Louis Harris Associates, Inc., June 1984.

Public Perceptions Of The "Biggest Problems" Facing Public Schools



Source Phi Delta Kappa. The Annual Gallup Poll of the Public Attitudes Toward Public Schools 1984

Teacher Perceptions Of The Severity Of Problems



Source The Metropolitan Life Survey of The American Teacher, Louis Harris Associates Inc., June 1984

- The general public in the Gallup Poll on local public schools has seen discipline as the number one problem for the past 13 years. Drugs have also been perceived as a problem.
- Teachers have a different view of problems with schools. The Metropolitan Life/Harris Survey of American Teachers found that in 1984, inadequate financial support for the schools and students' lack of interest in their classes were the most serious problems.

SCHOOL ENVIRONMENT

A substantial body of research has examined the characteristics of effective schools. These widely reported studies have concluded that the following factors are key elements in school performance:

Climate—a safe, orderly and collegial environment that support teaching and learning

Leadership—active involvement of the principal in the instructional program and recognition of academic achievement

Expectations—a belief that all children should be expected to master basic subjects, to have potential for success, and to apply themselves diligently to academic work

Purposes—a commonly understood goal that reflects shared education values and a strong, well-defined curriculum

Evaluation—measurement of student progress against norms that all are expected to achieve on topics they are taught and against nationally validated standards.

One guide in the Department of Education indicators project has been to use what researchers have learned about conditions and actions that make a difference in schooling, such as findings about effective schools. In the case of effective schools studies:

- Some observers argue that the factors summarized above are of limited validity for secondary schools because findings have primarily been derived from elementary school studies.

- Others point to studies on such topics as magnet schools and well-managed corporations as supporting a broader interpretation that many of these same factors would apply to all schools.

However, most observers would agree that we do not have a ready source of data to permit a national report on these qualities for either elementary or secondary schools. Therefore, the Department is continuing to search for sources that might serve to provide such information periodically.

One source to be available over the next several months is a 1984 follow-up study of schools that participated in "High School and Beyond" in 1980. In this follow-up, teachers and administrators in some 500 schools, nationwide, are responding to questions on such topics as the following:

Climate

- Whether the Learning environment is conducive to student achievement
- How the present education climate of the school compares with 1980-81
- How the present disciplinary climate of the school compares with 1980-81
- Whether there are standards of classroom discipline teachers are expected to enforce

Leadership

- The extent to which principals have helped teachers improve their instructional or class management
- How teacher expectations for students have changed since 1980-81
- Amount of time devoted to classroom routines, behavior, and instruction
- How teachers compare the time devoted to nonteaching school activities now compared with 1980-81
- Number of writing assignments of at least one page assigned to 11th and 12th graders

Purposes

- Whether teachers and administrators believe that school goals are clear
- How teachers and administrators rank eight goals for students (including basic literacy, academic excellence, citizenship, occupational skills, work habits and self-discipline, personal growth, human relation skills, and moral or religious values).

It may be possible to derive indicators of school environment quality from these data, perhaps by selecting a small number of these measures as representative of all, or by combining several into a composite index. Of course, as elsewhere, any such measures would be far more useful if they were repeated periodically.

Whatever school decisions are made on staffing and spending, ultimately the services to be offered must address the needs of the student who will attend. Some students' educational needs differ in character and often in cumulative quantity, from those of others. A measure of needs for "extra" services is a key indicator of services schools must provide.

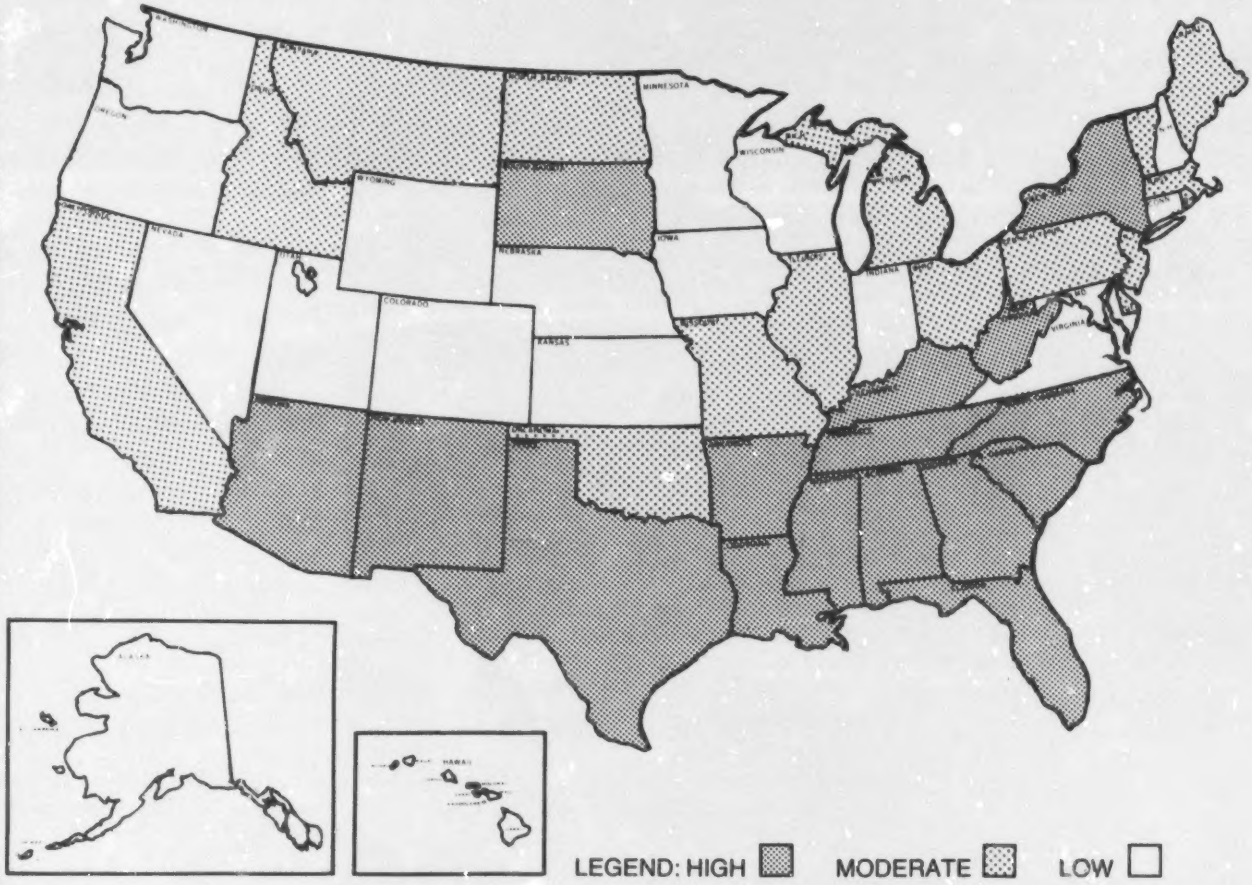
The table presents a composite index of relative requirements among States for special educational services. The index reflects the proportion of children who have some characteristics associated with special educational services and is weighted to account for the relative cost of providing these services.

The weights used in this instance are rough approximations of the actual costs experienced by school districts across the country. In the future, better data and further analyses should lead to weights that are more reflective of actual costs.

- Studies have shown that many of the language minority children who are counted as limited English proficient (LEP) use English as their only or usual language. Based on these studies, the number of children who require special English language services because of their inability to function in English is estimated to be substantially less than the 3.6 million LEP population (aged 5-17) estimate that served as the basis for the percentage distribution shown above. These data are, however, the latest available State-by-State estimates of the LEP student population. During 1985, State-by-State results of the recent English Language Proficiency Survey, conducted by the Bureau of the Census, will become available and this index will be recalculated.

State and Region	Composite Index of Educational Service Requirements: Percent Children 5-17 in Poverty 1980	Percent Handicapped Children 1984	Percent* Limited-English Proficient Children 1980	Index of Educational Services Requirements	Classification on Index
United States	18.3	10.9	9.6		
New England					
Connecticut	10.4	13.7	3.1	0.3	Low
Maine	18.1	13.9	3.1	11.0	Moderate
Massachusetts	12.3	13.9	3.0	11.0	Moderate
New Hampshire	8.9	9.6	3.1	6.0	Low
Rhode Island	12.6	13.5	4.3	11.5	Moderate
Vermont	13.0	10.9	2.2	10.0	Moderate
Mideast					
Delaware	14.6	16.4	2.4	11.0	Moderate
District of Columbia	36.3	8.1	2.3	12.0	High
Maryland	11.9	13.3	2.2	8.0	Low
New Jersey	13.3	14.4	6.3	11.5	Moderate
New York	17.9	10.5	14.3	14.0	High
Pennsylvania	13.2	11.3	3.1	10.0	Moderate
Great Lakes					
Illinois	14.1	13.9	3.9	11.0	Moderate
Indiana	11.0	10.3	2.2	7.0	Low
Michigan	12.4	9.1	1.4	9.0	Moderate
Ohio	12.2	11.0	1.9	10.0	Moderate
Wisconsin	9.6	9.3	0.9	6.0	Low
Plains					
Iowa	10.8	11.4	1.9	8.0	Low
Kansas	10.7	10.6	1.8	7.0	Low
Minnesota	9.3	11.2	1.2	7.0	Low
Missouri	14.0	12.3	0.8	11.0	Moderate
Nebraska	11.6	11.4	2.0	8.0	Low
North Dakota	14.0	9.9	1.8	9.0	Moderate
South Dakota	19.4	9.6	1.2	12.0	High
Southeast					
Alabama	23.1	11.7	*	13.0	High
Arkansas	22.7	11.3	*	12.0	High
Florida	17.7	10.6	3.9	13.5	High
Georgia	3.3	10.4	1.0	12.0	High
Kentucky	21.2	11.5	*	13.0	High
Louisiana	23.1	10.9	3.0	13.5	High
Mississippi	30.4	11.0	*	12.0	High
North Carolina	17.8	11.2	*	12.0	High
South Carolina	30.7	12.0	*	13.0	High
Tennessee	30.2	12.6	*	13.0	High
Virginia	14.4	10.6	1.3	10.0	Moderate
West Virginia	10.2	11.3	*	13.0	High
Southwest					
Arizona	15.8	10.3	13.0	13.0	High
New Mexico	21.7	10.1	23.4	13.0	High
Oklahoma	15.1	11.1	2.6	10.0	Moderate
Texas	10.4	9.9	10.0	13.0	High
Rocky Mountains					
Colorado	10.8	8.4	6.3	6.5	Low
Idaho	13.4	8.7	2.7	9.0	Moderate
Montana	13.7	10.1	2.0	9.0	Moderate
Utah	9.8	10.9	2.2	70	Low
Wyoming	7.3	11.4	2.1	8.0	Low
Far West					
California	14.2	8.6	14.1	10.0	Moderate
Nevada	9.4	9.0	3.6	6.0	Low
Oregon	10.8	10.3	3.1	7.0	Low
Washington	10.3	9.1	3.2	6.0	Low
Alaska	11.4	11.3	6.7	7.5	Low
Hawaii	11.7	7.9	12.4	7.0	Low

Index of Requirements for Special Educational Services
(A measure of relative need for special educational services based on demographic characteristics)



Source: Based on methodology of Department of Education School Finance Project, Updated January, 1985

- A composite index of educational need shows that States in the South have a higher student educational need than other geographic regions, but some individual States outside that area also have a high index of need.
- Need is based on a measure of the children in poverty, those served by programs for the handicapped, and children with limited-English proficiency. Each State's population has been compared with national means, and weighted by a measure of extra educational costs for children in each group.

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The proportion of students enrolled in the schools by age cohort is a measure of school drawing or holding power. While the bulk of youth within the range of compulsory attendance are enrolled in school, of particular importance are the proportions of youth at the upper age range and at pre-school levels. This indicator traces school enrollment of American youth since the early part of the century and also provides in-depth information about enrollment trends of subgroups of the student population.

Ratio of Student Enrollment to Population: 1964 to 1981

Year	3- and 4-Year Olds	5- and 6-Year Olds	16- and 17-Year Olds
1964	9.5	83.3	87.7
1965	10.6	84.4	87.4
1966	12.5	85.1	88.5
1967	14.2	87.4	88.3
1968	15.7	87.6	90.2
1969	16.1	88.4	89.7
1970	20.5	89.5	90.0
1971	21.2	91.6	90.2
1972	24.4	91.7	88.9
1973	24.2	92.5	88.3
1974	28.8	94.2	87.9
1975	31.5	94.7	89.0
1976	31.3	95.5	89.1
1977	32.0	95.8	88.9
1978	34.2	95.3	89.1
1979	35.1	95.8	89.2
1980	36.7	95.7	89.0
1981	36.0	94.0	90.6
1982	36.4	95.0	90.6
1983	37.5	95.4	91.7

Source: U.S. Department of Commerce, Bureau of the Census, Current Population Reports, Series P-20.

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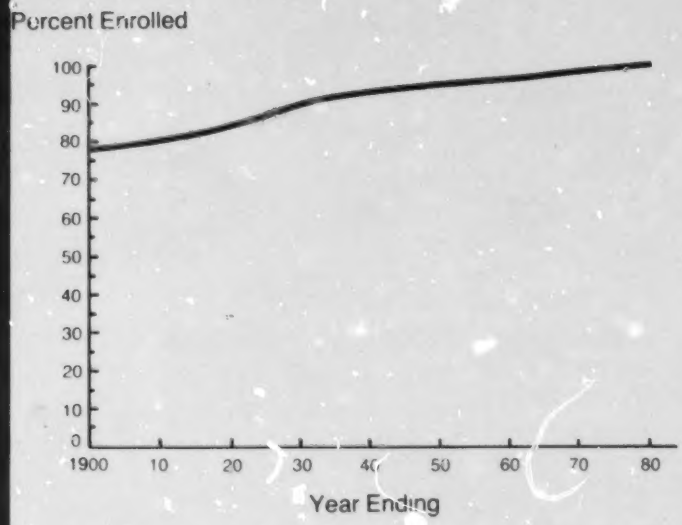
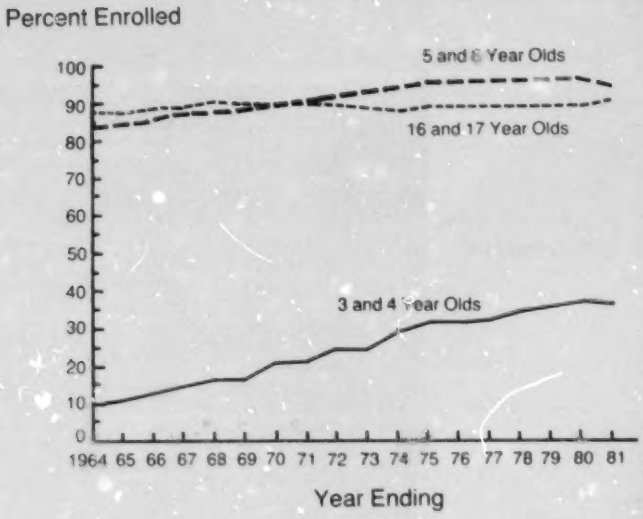
Ratio Of Student Enrollment To Population Aged 5 to 17 Years, 1900 To 1980



Source: NCES, Statistics of State School Systems

Ratio Of Student Enrollment To Population By Age Group,1964-1981



Source: U.S. Bureau of the Census, Current Population Reports

- Of the U.S. population aged 5 to 17, nearly 99% are enrolled in school. The proportion has risen 5% since 1940, and compares with 78% in 1900.

- Over the past two decades,

  — The most significant changes in school enrollment have been among 3 and 4 year olds. From about 10% enrolled in the mid- 1900's, the proportion had reached 36% by 1981. Enrollment rates among Blacks have consistently exceeded those of Whites; children of Hispanic background participate less frequently in school programs at these ages.

  — About 19 of every 20 children of 5 and 6 years are enrolled in school, a level reached in 1974-75 after climbing in the prior decade. Hispanic enrollment participation is somewhat lower.

  — Enrollment of 16 and 17 year olds has held steady at about nine-tenths of the population, with Black and White rates equal from the early 1970's to the present time. The rate for Hispanic youth has been a little above eight out of ten.

STATE GOVERNANCE

Since A Nation At Risk and other educational reform reports in 1983, there has been an unusually great amount of activity by State legislatures, boards, and departments of education in toughening the standards of their systems. Of course, State mandated standards are not a direct measure of what happens in the classroom or of the achievement of our nation's students, but they can serve as one indicator of interest in education and of intent to improve some aspects of schooling over which State policy officials have some control.

The following data present a time trend of the number of Carnegie Units (1-year courses) required to graduate from high school and how many units are required in basic subjects. Note, however, that much of the activity and responsibility for such requirements rests below the State level at the local level. Many states have strong traditions of local control in education and many local requirements will vary or even surpass State requirements.

Carnegie Units Required to Graduate from High School

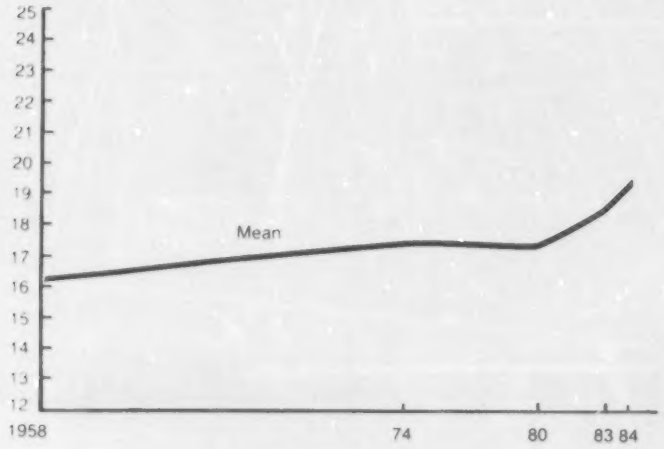
	1958	1974	1980	1983	1984
Mean	16.2	17.4	17.3	18.5	19.3
Number of states with requirement	40	40	39	42	46

Carnegie Units Required in Language Arts, Social Studies, Mathematics, and Science

	1958				1974				1980				1983				1984			
	LA	SS	MAT	SCI	LA	SS	MAT	SCI	LA	SS	MAT	SCI	LA	SS	MAT	SCI	LA	SS	MAT	SCI
Mean	3.4	1.9	1.1	1.2	3.4	2	1.3	1.2	3.4	2	1.2	1.2	3.6	2.1	1.9	1.7	3.8	2.4	2.1	1.9
Number of states with requirement	37	44	31	31	40	45	36	35	39	42	35	35	41	44	38	38	45	49	44	44

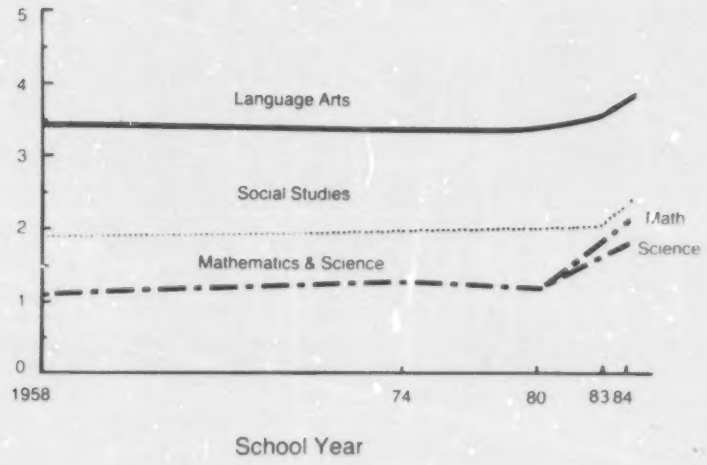
State Required Carnegie Units
1958-1984

Mean Number of Required Carnegie Units



State Required Carnegie Units by Subject
1958-1984

Mean Number of Required Carnegie Units



Sources: National Assoc. of Secondary School Principals, Education Commission of the States, Department of Health, Education, and Welfare

- After 20 years of stability, there has been a sharp increase since 1980 in the number of Carnegie Units in mathematics and science required by the States for high school graduation. There has been a concomitant but smaller increase in the required units for language arts.

APPENDIX A: SUPPLEMENTARY DATA

Age Group, Race, and Region	Performance			Change		
	1971	1975	1980	1971 to 1975	1975 to 1980	1971 to 1980
	Average Percent Correct					
9-year-olds	64.0	65.3	67.9	1.3*	2.6*	3.9*
White	66.4	67.0	69.3	.6	2.3*	2.8*
Northeast	67.8	69.0	71.6	1.2	2.6*	3.7*
Southeast	63.9	65.3	69.2	1.4	3.9*	5.3*
Central	68.0	69.1	70.3	1.1	1.2	2.3*
West	64.8	66.6	68.8	1.8	2.2*	4.0*
Black	49.7	54.5	59.6	4.8*	5.1*	9.9*
Northeast	54.1	56.4	62.0	2.2	5.6*	7.8*
Southeast	45.4	53.1	58.1	7.6*	5.0*	12.7*
Central	51.0	56.8	60.6	5.8*	3.8*	9.7*
West	51.7	52.6	57.2	.9	4.6	5.5
13-year-olds	60.0	59.9	60.8	-.1	.9	.8
White	62.6	61.9	62.6	-.7	.7	(1)
Northeast	64.3	63.1	63.6	-1.2	.5	-.7
Southeast	58.9	60.4	61.6	.6	1.1	1.7
Central	64.4	64.3	64.8	.0	.5	.4
West	61.1	62.1	63.2	1.0	1.1	2.2*
Black	45.4	46.4	49.6	1.0	3.2*	4.2*
Northeast	48.8	48.5	53.2	-.3	4.7*	4.4
Southeast	41.5	45.5	45.5	4.0*	-.1	3.9
Central	47.7	48.6	52.4	.9	3.7	4.7
West	48.1	42.6	50.5	-5.6*	7.9*	2.4
17-year-olds	68.9	69.0	68.2	(1)	-.8	-.7
White	71.2	71.2	70.6	(1)	-.6	-.7
Northeast	72.7	72.6	70.8	-.1	-1.8	-1.9
Southeast	68.3	70.2	70.2	2.0	.0	2.0
Central	72.6	72.9	71.6	.3	-1.3	-1.0
West	69.9	70.6	71.6	.6	1.0	1.7
Black	51.7	52.1	52.2	.5	.1	.5
Northeast	56.1	54.1	56.1	-1.9	1.9	.0
Southeast	47.7	50.7	49.8	3.0	-.9	2.1
Central	53.8	54.9	54.2	1.1	-.7	.4
West	51.8	49.4	50.8	-2.4	1.4	-1.0

*Indicates statistically significant change in performance between assessments.

[1] Less than 0.05 percent.

AVERAGE READING PERFORMANCE of 9-,13-, and 17-YEAR-OLD STUDENTS, by RACE and REGION: SCHOOL YEAR 1970-71, 1974-75, and 19 9-80

SOURCE: National Assessment of Educational Progress, Three National Assessments of Reading: Changes in Performance, 1979-80 (Report No. 11-R-01), April 1981.

—National Assessment of Educational Progress in mathematics for ages 9, 13, and 17, by selected characteristics of participants: United States, 1972-73 and 1977-78

Selected characteristics of participants	Age 9			Age 13			Age17[1]		
	Mean % correct		Mean change	Mean % correct		Mean change	Mean % correct		Mean change
	1972-73	1977-78		1972-73	1977-78		1972-73	1977-78	
1	2	3	4	5	6	7	8	9	10
All participants	38.1	36.8	−1.3	52.6	50.6	−2.0	51.7	48.1	−3.6
Region:									
Northeast	41.9	42.0	0.0	57.4	55.8	−1.6	54.5	51.3	−3.2
Southeast	32.0	32.4	0.4	46.8	44.2	−2.6	47.4	43.6	−3.8
Central	39.9	38.7	−1.2	55.2	53.0	−2.1	52.5	50.8	−1.7
West	37.6	34.0	−3.7	49.9	48.5	−1.4	51.2	45.4	−5.8
Sex:									
Male	38.1	37.0	−1.2	52.7	50.9	−1.8	53.8	49.9	−3.9
Female	38.1	36.7	−1.4	52.5	50.2	−2.3	49.7	46.4	−3.2
Race:									
Black	23.4	26.3	2.9	31.8	32.4	0.6	33.5	30.9	−2.6
White	41.1	39.1	−2.0	56.6	54.2	−2.4	54.5	51.0	−3.5
Hispanic	28.1	28.6	0.6	39.7	36.7	−3.0	38.3	36.0	−2.3
Size and type of community:									
Extreme rural	34.0	32.1	−1.9	50.0	45.2	−4.8	48.4	46.4	−2.0
Low metropolitan	25.3	27.7	2.4	34.7	36.7	2.0	40.7	35.1	−5.7
High metropolitan	46.6	46.0	−0.7	63.6	59.4	−4.2	59.5	57.3	−2.2
Main big city	35.0	33.6	−1.4	48.9	47.0	−1.9	47.3	45.7	−1.6
Urban fringe	42.4	41.4	−1.0	55.8	55.3	−0.5	54.1	51.2	−2.9
Medium city	39.6	37.8	−1.7	53.4	56.6	3.2	54.0	51.8	−2.2
Small place	37.0	36.0	−1.1	52.3	48.9	−3.4	51.2	47.0	−4.2

[1]All participants of this age were in school.

NOTE.—The mean change is equal to the difference in the mean correct for each year but may differ in this table due to rounding.

SOURCE: National Assessment of Educational Progress, *Mathematical Technical report: Summary Volume*, 1980.

—National Assessment of Educational Progress in mathematics for ages 9, 13, and 17, by selected characteristics of participants: United States, 1977-78 and 1981-82

Selected characteristics of participants	Age 9			Age 13			Age17[1]		
	Mean % correct		Mean change	Mean % correct		Mean change	Mean % correct		Mean change
	1977-78	1981-82		1977-78	1981-82		1977-78	1981-82	
1	2	3	4	5	6	7	8	9	10
All participants	55.4	56.4	1.0	56.6	60.5	3.9	60.4	60.2	−0.2
Region:									
Northeast	58.6	59.0	0.4	60.3	64.4	4.1	63.1	62.8	−0.3
Southeast	51.4	52.9	1.5	51.6	56.2	4.6	56.5	56.7	0.2
Central	58.2	57.8	−0.4	59.3	61.9	2.6	63.0	62.1	−0.9
West	52.6	55.9	3.3	54.5	59.0	4.5	57.7	58.4	0.7
Sex:									
Male	55.3	55.8	0.5	56.4	60.4	4.0	62.0	61.6	−0.4
Female	55.3	56.9	1.6	56.9	60.6	3.7	58.8	58.9	0.1
Race:									
Black	43.1	45.2	2.1	41.7	48.2	6.5	43.7	45.0	1.3
White	58.1	58.8	0.7	59.9	63.1	3.2	63.2	63.1	−0.1
Hispanic	46.6	47.7	1.1	45.4	51.9	6.5	48.5	49.4	0.9
community:									
Extreme rural	51.1	52.7	1.6	52.6	56.3	3.7	58.0	57.0	−1.0
Low metropolitan	44.4	45.5	1.0	43.5	49.3	5.8	45.8	47.7	1.9
High metropolitan	65.0	66.3	1.3	65.1	70.7	5.6	70.0	69.7	−0.3
Main big city	51.9	54.2	2.3	53.1	57.4	4.3	57.9	57.4	−0.5
Urban fringe	59.8	59.4	−0.4	61.0	64.4	3.4	63.6	62.3	−1.3
Medium city	56.4	56.5	0.1	61.9	63.0	1.1	65.0	62.0	−3.0
Small place	54.7	55.5	0.8	55.1	58.8	3.7	58.5	59.2	0.7

[1]All participants of this age were in school.

NOTE.—The mean change is equal to the difference in the mean correct for each year but may differ in this table due to rounding.

SOURCE: Derived from data available in the files of the National Assessment of Educational Progress, July 1982.

—National Assessment of Educational Progress in science for ages 9, 13, and 17 by selected characteristics of participants: United States, 1972-73 and 1976-77

Selected characteristics of participants	Age 9			Age 13			Age17[1]		
	Mean % correct		Mean change	Mean % correct		Mean change	Mean % correct		Mean change
	1972-73	1976-77		1972-73	1976-77		1972-73	1976-77	
1	2	3	4	5	6	7	8	9	10
All participants	52.3	52.2	−0.1	54.5	53.8	−0.7	48.4	46.5	−1.9
Region:									
Northeast	53.6	54.3	0.7	56.0	55.9	−0.1	49.4	48.8	−0.8
Southeast	48.5	48.0	−0.5	51.8	51.1	−0.7	46.3	44.3	−2.0
Central	53.9	53.3	−0.6	56.0	55.4	−0.6	49.4	47.7	−1.7
West	52.7	52.6	−0.1	54.1	52.4	−1.7	48.0	45.5	−2.5
Sex:									
Male	53.6	53.5	−0.1	56.3	56.1	−0.2	51.9	49.7	−2.2
Female	51.0	50.8	−0.2	52.7	51.6	−1.1	45.1	43.3	−1.8
Race:									
Black	39.8	39.4	−0.4	41.1	42.0	0.9	35.8	33.0	−2.8
White	55.0	54.6	−0.4	57.2	56.4	−0.8	50.6	48.7	−1.9
Hispanic	43.0	44.8	1.8	45.3	43.4	−1.9	37.3	38.3	1.0
Size and type of community:									
Extreme rural	50.1	52.9	2.8	52.6	53.4	0.8	47.6	46.2	−1.4
Low metropolitan	40.3	41.0	0.7	43.8	42.2	−1.6	40.3	36.4	−3.9
High metropolitan	58.0	59.5	1.5	59.9	59.4	−0.5	53.1	50.9	−2.2
Main big city	48.7	47.6	−1.1	51.4	50.6	−0.8	44.8	42.1	−2.7
Urban fringe	54.8	56.4	1.6	56.0	56.3	0.3	49.5	49.0	−0.5
Medium city	54.8	51.5	−3.3	54.6	53.7	−0.9	48.3	46.7	−1.6
Small place	52.2	52.3	0.1	55.1	54.0	−1.1	49.2	46.9	−2.3

[1]All participants of this age were in school.

NOTE.—The mean change is equal to the difference in the mean correct for each year but may differ in this table due to rounding.

SOURCE: National Assessment of Educational Progress, *Three Assessments of Science, 1969-77: Technical Summary*, 1979.

—Science achievement, by age group and other characteristics of participants: 1969-70 and 1972-73

	Mean percentages of correct responses,[2] by age of participant and year								
	9-year-olds			13-year-olds			17-year-olds[1]		
	1969-70	1972-73	Diff.	1969-70	1972-73	Diff.	1969-70	1972-73	Diff.
National total	60.6	58.8	−1.8	58.8	56.9	−1.9	44.2	42.8	−1.4
Region:									
Northeast	62.9	60.5	−2.4	60.6	59.1	−1.5	46.6	44.6	−2.0
Southeast	55.2	54.8	−0.4	53.9	54.1	0.2	40.9	41.4	0.5
Central	62.1	60.2	−1.9	61.1	58.4	−2.8	44.0	43.0	−1.0
West	60.8	59.4	−1.4	58.4	55.5	−2.9	44.4	41.7	−2.7
Sex:									
Male	61.7	59.9	−1.8	61.0	59.0	−2.0	47.3	45.8	−1.5
Female	59.4	57.7	−1.7	56.7	54.7	−1.9	41.2	40.0	−1.2
Race:									
White	63.5	61.9	−1.6	62.0	60.2	−1.8	45.7	44.8	−0.9
Black	46.6	45.6	−1.0	44.0	40.7	−3.3	33.4	33.1	−0.3
Size and type of community:									
Low metro	45.4	45.6	0.2	45.6	43.8	−1.8	37.0	35.1	−1.9
High metro	68.0	65.7	−2.3	64.7	63.7	−1.1	49.2	47.4	−1.8
Main big city	58.0	57.3	−0.7	54.9	54.5	−0.4	44.6	40.1	−4.5
Urban fringe	63.3	60.5	−2.8	61.5	57.6	−3.9	44.6	42.5	−2.1
Medium city	61.2	60.3	−0.9	61.1	58.0	−3.0	46.2	43.0	−3.2
Small places	61.2	59.6	−1.6	59.5	58.1	−1.4	43.3	44.0	0.7
Extreme rural	53.8	56.0	2.2	52.2	54.8	2.7	40.6	41.2	0.6

[1]In-school respondents only.

[2]Number of exercises used to calculate mean percent correct: age 9, 94 exercises; age 13, 69 exercises; age 17, 66 exercises.

NOTE.—For definitions, see Technical Notes.

SOURCE: National Assessment of Educational Progress, Education Commission of the States, Denver, Colo., unpublished data.

Scholastic Aptitude Test (SAT) Scores

Percentage of High school graduates who scored 600 or more in the verbal test and those who scored 600 or more in the mathematics test: 1972-1984

Graduation year	Total high school graduates (000)	Verbal		Mathematics	
		Number with scores of 600 or more	Percent with scores of 600 or more	Number with scores of 600 or more	Percent with scores of 600 or more
1972	3,001	116,630	3.9	182,602	6.1
1973	3,036	98,256	3.2	169,029	5.6
1974	3,074	98,766	3.2	169,844	5.5
1975	3,133	79,133	2.5	155,516	5.0
1976	3,148	81,964	2.6	163,398	5.2
1977	3,154	78,342	2.5	157,466	5.0
1978	3,127	77,732	2.5	155,846	5.0
1979	3,101	76,261	2.5	149,021	4.8
1980	3,043	71,363	2.3	149,615	4.9
1981	3,020	69,612	2.3	143,566	4.8
1982	3,001	70,448	2.3	150,822	5.0
1983	2,890 1/	66,292	2.3	153,344	5.3
1984	2,741 2/	70,479	2.6	160,634	5.9

1/ Preliminary.

2/ Projected.

SOURCE: College Entrance Examination Board, National Report, College-Bound Seniors, various years. High school graduates: National Center for Education Statistics, The Condition of Education 1985 Edition, forthcoming.

American College Testing (ACT) Scores

Percentage of high school graduates who scored 26 or more in the English test and those who scored 600 or more in the mathematics test: 1972-1983

Graduation year	Total high school graduates (000)	English			Mathematics		
		Number with scores of 26 or more	Standard deviation	Percent with scores of 26 or more	Number with scores of 26 or more	Standard deviation	Percent with scores of 26 or more
1972	3,001	20,319	5.5	0.68	77,890	7.2	2.60
1973	3,036	44,246	5.3	1.46	169,611	7.2	5.59
1974	3,074	36,998	5.2	1.20	155,390	7.4	5.05
1975	3,133	35,722	5.3	1.14	150,030	7.9	4.79
1976	3,148	34,583	5.4	1.10	131,415	7.6	4.17
1977	3,154	44,614	5.2	1.41	148,712	7.8	4.72
1978	3,127	53,884	5.4	1.72	153,954	7.7	4.92
1979	3,101	46,813	5.4	1.51	140,438	7.6	4.53
1980	3,043	49,332	5.4	1.62	147,996	7.6	4.86
1981	3,020	50,146	5.4	1.66	142,079	7.9	4.70
1982	3,001	56,316	5.3	1.88	136,768	8.0	4.56
1983	2,890 1/	58,471	5.5	2.02	142,001	8.2	4.91

1/ Preliminary.

NOTES: Students scores were based on ACT samples of 10 percent. For both the English and the Mathematics tests, the range of possible scores is a low of 1 to a high of 36. The number of students scoring 26 or more was obtained by taking the percentage (rounded to the nearest whole percent) of the students scoring 26-36 times the number of students in the sample and multiplying by 10.

SOURCE: The American College Testing Program, College Student Profiles: Norms for the ACT Assessment, various years. High school graduates: National Center for Education Statistics, The Condition of Education 1985 Edition, forthcoming

COLLEGE ENTRANCE EXAMINATION SCORES: 1980 and 1984

ACT States

	1980 Score	1984 Score	Change	1984 % of H.S. Grads Taking Test
Alabama	17.6	17.4	+0.4	58.7
Alaska	18.9	18.2	-0.7	36.7
Arizona	18.9	18.7	-0.2	41.8
Arkansas	17.8	17.6	-0.2	61.4
Colorado	19.6	19.7	+0.1	70.2
Idaho	18.8	18.9	+0.1	59.2
Illinois	18.5	18.7	+0.2	71.5
Iowa	20.3	20.2	-0.3	58.9
Kansas	18.9	19.2	+0.3	63.5
Kentucky	17.7	17.9	+0.2	62.0
Louisiana	16.8	16.6	-0.2	77.9
Michigan	18.9	18.8	-0.1	55.6
Minnesota	20.3	20.2	-0.1	28.6
Mississippi	15.6	15.6	0	86.2
Missouri	18.9	18.8	-0.1	51.3
Montana	19.6	19.4	-0.2	52.6
Nebraska	20.0	20.1	+0.1	77.1
Nevada	18.6	18.7	+0.1	45.6
New Mexico	17.8	17.6	-0.2	63.1
North Dakota	18.0	17.9	-0.1	62.4
Ohio	19.1	19.2	+0.1	50.3
Oklahoma	17.8	17.6	-0.2	58.7
South Dakota	19.3	19.2	-0.1	69.7
Tennessee	17.5	17.7	+0.2	64.5
Utah	18.6	18.8	+0.2	74.0
West Virginia	17.7	17.4	-0.3	52.4
Wisconsin	20.4	20.4	0	35.2
Wyoming	19.3	19.3	0	60.3

Source: American College Testing Program

SAT States

	1980 Score	1984 Score	Change	1984 % of H.S. Grads taking Test
California	886	897	1	39.1
Connecticut	897	904	7	62.8
Delaware	900	902	2	48.2
Dist. of Col.	780	823	43	49.9
Florida	888	890	2	39.5
Georgia	814	822	8	48.2
Hawaii	868	869	1	48.3
Indiana	857	864	7	44.7
Maine	894	892	-2	47.3
Maryland	885	897	12	48.0
Massachusetts	887	896	9	62.6
New Hampshire	926	931	5	56.9
New Jersey	867	876	9	60.6
New York	809	894	5	61.3
North Carolina	822	827	5	46.4
Oregon	893	907	14	43.6
Pennsylvania	886	887	1	50.9
Rhode Island	875	885	10	55.6
South Carolina	784	803	19	44.8
Texas	871	866	-5	33.0
Vermont	900	907	7	51.7
Virginia	883	894	11	50.1

Source: The College Board

Current Expenditures Per Pupil in Average Daily Attendance in Public Elementary/Secondary School by State: 1970-71 and 1982-83

State	Current Expenditures[1] Per Pupil in 1982-83	Current Expenditures Per Pupil in 1970-71		Percent Increase in Current Expenditures Per Pupil from 1970-71 to 1982-83	
		Current (1970-71) Dollars	Constant (1982-83) Dollars[2]	Current 1970-71 Dollars	Constant (1982-83) Dollars[2]
US.....	$2,948	$ 911	$2,252	223.6	30.9
AK.....	7,325	1,507	3,725	386.1	96.6
AL.....	2,177	605	1,495	259.8	45.6
AR.....	1,971	600	1,483	228.5	32.9
AZ.....	2,524	783	1,935	222.3	30.4
CA.....	2,733	906	2,239	201.7	22.1
CO.....	3,171	841	2,079	277.1	52.5
CT.....	3,636	1,056	2,610	244.3	39.3
DE.....	3,456	1,047	2,588	230.1	33.5
DC.....	4,260	1,178	2,912	261.6	46.3
FL.....	2,680	829	2,049	223.3	30.8
GA.....	2,169	714	1,765	203.8	22.9
HI.....	3,239	1,023	2,529	216.6	28.1
IA.....	3,095	901	2,227	243.5	39.0
ID.....	2,052	650	1,607	215.7	27.7
IL.....	3,100	1,036	2,561	199.2	21.0
IN.....	2,414	809	2,000	198.4	20.7
KS.....	3,058	823	2,034	271.6	50.3
KY.....	2,100	670	1,656	213.4	26.8
LA.....	2,739	791	1,955	246.3	40.1
MA.....	3,378	927	2,291	264.4	47.4
MD.....	3,445	1,039	2,568	231.6	34.2
ME.....	2,458	751	1,856	227.3	32.4
MI.....	3,307	1,007	2,489	228.4	32.9
MN.....	3,085	1,049	2,593	194.1	19.0
MO.....	2,468	763	1,886	223.5	30.9
MS.....	1,849	602	1,488	207.1	24.3
MT.....	3,289	840	2,076	291.5	58.4
NC.....	2,162	686	1,696	215.2	27.5
ND.....	2,853	742	1,834	284.5	55.6
NE.....	2,984	865	2,138	245.0	39.6
NH.....	2,750	801	1,980	243.3	38.9
NJ.....	4,007	1,177	2,909	240.4	37.7
NM.....	2,901	746	1,844	288.9	57.3
NV.....	2,613	820	2,027	218.7	28.9
NY.....	4,686	1,567	3,873	199.0	21.0
OH.....	2,676	798	1,972	235.3	35.7
OK.....	2,805	676	1,671	314.9	67.9
OR.....	3,504	1,012	2,501	246.2	40.1
PA.....	3,329	952	2,353	249.7	41.5
RI.....	3,570	1,002	2,477	256.3	44.1
SC.....	2,017	659	1,629	206.1	23.8
SD.....	2,486	776	1,918	220.4	29.6
TN.....	2,027	623	1,540	225.4	31.6
TX.....	2,731	703	1,738	288.5	57.1
UT.....	2,013	701	1,733	187.2	16.2
VA.....	2,620	792	1,958	230.8	33.8
VT.....	3,051	854	2,111	257.3	44.5
WA.....	3,211	928	2,294	246.0	40.0
WI.....	3,237	984	2,432	229.0	33.1
WV.....	2,764	726	1,794	280.7	54.1
WY.....	4,045	931	2,301	334.5	75.8

[1] Includes expenditures for day schools only; excludes adult education, community colleges, and community services.

[2] Adjusted for inflation using the Index of State and Local Governments Purchases.

NOTE: Details may not add to totals because of rounding.

SOURCE: U.S. Department of Education, National Center for Education Statistics, Expenditures and Revenues for Public Elementary and Secondary Education: 1970-71, 1973 and preliminary data from the Common Core of Data, unpublished tablulations (August 1984).

STATE FISCAL EFFORT FOR PUBLIC ELEMENTARY AND SECONDARY SCHOOLS,

State Effort by Rank, 1982-83

- When compared with themselves, 45 States increased their own effort over the decade and 6 decreased their effort.
- When compared with each other, States that rose in rank order by 10 places or more between 1972-73 and 1982-83 were Alaska, Montana, New Mexico, North Dakota, Nebraska, Oklahoma, Florida, and Wyoming. Those that dropped in rank order by 10 or more places over the decade were Minnesota, Connecticut, Maryland, California, Indiana, Mississippi, Illinois, and New Hampshire.

This index defines each State's effort to finance public schools as State and local revenues related to State wealth, with wealth weighted by the share of State population enrolled in public schools. It is a measure of the amount of school revenues in relation to the tax base (where personal income represents the tax base) but adjusts the tax base to reflect a student "share" of public services for each State.

1982-83 State Fiscal Effort for Public Elementary and Secondary Schools

State	Revenues			Personal Income	State Pop.	Enrollment	Formula x 1000
	State	Local	Total				
	(millions)			(millions)	(thous)	(thous)	
Wyoming	$163	$386	$549	$ 6225	509	102	442
Alaska	473	87	560	7491	444	89	371
Montana	262	232	494	7741	805	152	337
New York	4647	6327	10973	214390	17567	2719	331
Oregon	466	951	1417	27078	2668	448	311
Pennsylvania	2844	3100	5943	129815	11879	1784	305
Vermont	98	165	263	4950	520	91	302
New Mexico	624	106	731	12692	1367	269	293
New Jersey	1891	2588	4479	97770	7427	1173	290
Rhode Island	178	262	440	10416	953	139	289
Wisconsin	995	1398	2393	51124	4745	785	283
Michigan	1757	3462	5219	98007	9116	1762	276
Minnesota	1054	1164	2218	46659	4133	715	275
Washington	1889	480	2368	50004	4276	739	274
North Dakota	202	145	347	7299	672	117	273
Colorado	766	1048	1814	37581	3071	545	272
Delaware	221	79	300	7147	600	93	272
Iowa	647	813	1459	30904	2906	505	272
Massachusettes	1154	1828	2982	70647	5750	909	267
Maine	272	237	509	10527	1136	212	259
Nebraska	219	538	758	17300	1589	269	259
Utah	477	354	831	13661	1571	370	258
South Dakota	92	206	298	6481	694	124	258
Kansas	568	669	1236	28531	2408	407	256
West Virginia	587	264	851	17582	1961	375	253

State	Revenues			Personal Income	State Pop.	Enrollment	Formula x 1000
	State	Local	Total				
	(millions)			(millions)	(thous)	(thous)	
Oklahoma	1208	452	1660	35711	3226	594	252
Florida	2410	1619	4029	114383	10466	1485	248
Louisanna	1164	759	1923	44112	4383	776	246
Ohio	2223	2653	4876	114828	10772	1860	246
Maryland	849	1227	2075	52441	4270	699	242
Connecticut	617	1020	1637	43566	3126	486	241
Indiana	1369	1000	2369	54928	5482	1000	237
Hawaii	438	1	438	11552	997	162	233
Dist. of Col.	0	307	307	9227	626	91	228
Virginia	1104	1401	2505	62272	5485	975	226
South Carolina	735	450	1185	27791	3227	609	226
New Hampshire	36	362	398	10551	948	160	223
Arizona	734	402	1136	29074	2892	510	221
Missouri	788	1057	1845	51408	4942	803	221
Texas	4132	3333	7465	174445	15329	2986	220
Alabama	963	381	1344	34225	3941	724	214
Illinois	1773	3017	4790	137898	11466	1880	212
Idaho	245	131	376	8805	977	203	205
North Carolina	1474	538	2012	55059	6019	1097	201
California	7631	2588	10219	311609	24697	4065	199
Nevada	186	169	355	10439	876	151	197
Arkansas	402	299	700	19480	2307	433	192
Kentucky	844	279	1124	33679	3692	651	189
Mississippi	485	193	678	19864	2569	468	187
Tennessee	598	735	1333	42034	4656	828	178
Georgia	1500	863	2362	54425	5648	1504	163

$$\text{Formula} = \frac{\text{Revenues (Total)}}{\text{Personal Income} \times (\text{Pupils/Population})}$$

Sources: State and local revenues, NCES; personal income, Bureau of Economic Analysis
State population, Bureau of Economic Analysis; public elementary and secondary enrollment, NCES.

1972-73 State Fiscal Effort for Public Elementary and Secondary Schools

State	Revenues			Personal Income	State Pop.	Enrollment	Formula x 1000
	State	Local	Total				
	(millions)			(millions)	(thous)	(thous)	
New York	$ 2510	$ 3317	$ 5827	$ 96528	18352	3449	321
Vermont	43	80	123	1828	463	106	292
Minnesota	703	463	1166	17145	3867	900	292
Pennsylvania	1459	1370	2829	15311	11905	2321	272
Connecticut	308	654	962	16773	3070	667	264
Rhode Island	76	138	215	4324	976	185	263
Michigan	1123	1533	2656	43282	9025	2124	261
Oregon	115	423	538	9541	2195	477	260
Maryland	542	629	1171	20215	4081	911	259
New Jersey	545	1507	2052	39469	7337	1482	257
Wisconsin	353	742	1095	19405	4498	987	257
Massachusetts	485	1034	1519	28502	5762	1205	255
Delaware	130	43	173	2951	574	133	253
Alaska	95	14	108	1726	326	83	248
Iowa	221	454	675	12630	2861	631	242
Montana	53	116	169	2943	719	172	240
Maine	84	129	213	3836	1035	245	234
California	1810	3388	5199	104191	20585	4459	230
Louisiana	435	241	676	13124	3762	842	230
Indiana	415	766	1181	22926	5296	1207	226
Washington	437	367	804	15598	3447	788	225
Colorado	173	402	575	10998	2405	573	219
Kansas	136	324	459	10260	2256	461	219
Missouri	360	584	944	20159	4753	1020	218
Utah	144	102	246	4232	1135	306	216
Illinois	1145	1379	2524	57812	11258	2321	212
New Mexico	163	52	216	3873	1078	283	212
South Dakota	20	110	130	2637	677	158	212
New Hampshire	13	141	154	3328	782	171	211
North Dakota	40	87	127	2745	631	138	211
Arizona	190	279	469	8609	2009	521	210
Ohio	783	1434	2217	48415	10747	2378	207
West Virginia	191	110	300	6428	1797	409	205
Virginia	368	605	973	21112	4828	1085	205
Nebraska	48	245	293	6785	1518	323	202
Texas	1164	1031	2195	46929	11759	2782	198
Oklahoma	223	220	443	10024	2657	601	195
South Carolina	279	146	425	9488	2718	627	194
Hawaii	175	0	175	4178	818	179	192
Florida	798	509	1307	33345	7520	1538	192
Kentucky	314	170	484	11965	3336	710	190
Dist. of Col.	144	0	144	4217	744	136	186
Nevada	49	80	129	2815	527	135	185
North Carolina	560	262	822	20065	5296	1173	185
Wyoming	34	34	68	1524	347	85	181
Georgia	428	334	762	18899	4807	1086	178
Arkansas	142	117	259	6596	2018	450	176
Mississippi	185	90	275	7086	2307	520	172
Alabama	322	132	454	12117	3540	771	172
Idaho	49	76	125	2981	763	189	170
Tennessee	263	246	508	14981	4088	903	154

Sources: State and local revenues, NCES; personal income, Bureau of Economic Analysis; State population, Bureau of Economic Analysis; public elementary and secondary enrollment, NCES.

TEACHERS EMPLOYED (IN FULL-TIME EQUIVALENTS) IN PUBLIC AND PRIVATE ELEMENTARY AND SECONDARY SCHOOLS, AND CANDIDATE SHORTAGES, BY FIELD OF ASSIGNMENT: 50 STATES AND D.C., NOVEMBER 1, 1983

Field of Assignment	Total Teachers		Candiate Shortages		Shortages per 1000 Teachers
	Number	Percent	Number	Percent	
Total	2,553,300	100.0	4,000	100.0	1.6
Preprimary Education	89,100	3.5	80	2.0	0.9
General Elementary Education	873,300	34.2	740	18.7	0.8
Art	50,700	2.0	180	4.6	3.6
Basic Skills/Remedial Education	42,300	1.7	120	3.1	2.9
Bilingual Education	29,900	1.2	260	6.6	8.8
Biological and Physical Sciences	131,100	5.1	230	5.7	1.7
Biology	28,800	1.1	50	1.2	1.7
Chemistry	14,600	0.6	30	0.7	1.9
Physics	8,700	0.3	40	1.0	4.5
General and All Other Sciences	79,000	3.1	110	2.8	1.4
Business (non-vocational)	53,800	2.1	20	0.5	0.4
Computer Science	9,200	0.4	30	0.9	3.7
English Language Arts	182,700	7.2	170	4.3	0.9
Foreign Languages	50,400	2.0	80	1.9	1.5
Health, Physical Education	131,500	5.1	100	2.5	0.8
Home Economics	38,100	1.5	30	0.7	0.7
Industrial Arts	43,700	1.7	80	2.1	1.9
Mathematics	147,100	5.8	260	6.6	1.8
Music	79,100	3.1	240	6.1	3.1
Reading	47,700	1.9	20	0.5	0.4
Social Studies/Social Sciences	142,400	5.6	70	1.7	0.5
Special Education	264,100	10.3	1,030	25.9	3.9
Mentally Retarded	54,400	2.1	150	3.9	2.8
Seriously Emotionally Disturbed	26,800	1.0	100	2.5	3.7
Specific Learning Disabled	75,200	2.9	190	4.8	2.6
Speech Impaired	27,700	1.1	180	4.4	6.3
Other Special Education	82,000	3.2	400	10.3	5.0
Vocational Education	64,300	2.5	70	1.7	1.1
Other Elementary Education	29,800	1.2	30	0.8	1.1
Other Secondary Education	53,500	2.1	120	3.0	2.2

Source: 1983-84 Survey of Teacher Demand and Shortage (NCES).

Note: Percentages are calculated on unrounded numbers.

GLOSSARY

GLOSSARY

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ACHIEVEMENT TEST-An examination that measures the extent to which a person has acquired certain information or mastered certain skills, usually as a result of specific instruction. 2,3,6,7

ATTENDANCE-The presence of a student on days when school is in session. A student may be counted present only when he is actually at school or is present at another place at a school activity which is sponsored by the school, is a part of the program of the school, and is personally supervised by a member of members of the school staff. This may include authorized independent study, work-study programs, field trips, athletic contests, music festivals, student conventions, instruction for homebound students, and similar activities when officially authorized under policies of the local school board. It does not include "making up" schoolwork at home, or activities supervised or sponsored by private individuals or groups. 20

AVERAGE DAILY ATTENDANCE (ADA)-The aggregate days attendance of a given school during a given reporting period divided by the number of days school is in session during this period. Only days on which the students are under the guidance and direction of teachers should be considered as days in session. The reporting period is generally a given regular school term. 20

BIOLOGY, GENERAL-A group of instructional programs that generally describes life forms, including the stucture, function, reproduction, growth, heredity, evolution, behavior, and distribution of living organisms. 8

BUSINESS AND MANAGEMENT- A group of instructional programs that describe the processess of purchasing, selling, producing, and interchanging of goods, commodities, and services in profit making and non-profit public and private institutions and agencies. 8,9

CARNEGIE UNIT-A standard of measurement that represents one credit for the completion of a 1-year course. 8,9,44,45

CLASS SIZE-The membership of a class as of a given date. 24,25

CLASSROOM TEACHER-A staff member assigned the professional activities of instructing students, in classroom situations,

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for which daily student attendance figures for the school system are kept. 24,25,28

COHORT-A group of individuals that have a statistical factor in common, e.g., year of birth. 42

COLLEGE-A postsecondary school which offers general or liberal arts education, usually leading to a first degree. Junior colleges and community colleges are included under this terminology. 12,13,14,15

CONSTANT DOLLARS-Dollar amounts that have been adjusted by means of price and cost indexes to eliminate inflationary factors and allow direct comparison across years. 20,21

CREDIT-The unit of value, awarded for the successful completion of certain courses, intended to indicate the quantity of course instruction in relation to the total requirements for a diploma, certificate, or degree. Credits are frequently expressed in terms such as "Carnegie units," "credits," "semester credit hours," and "quarter credit hours." 9

CURRENT DOLLARS-Dollar amounts that have not been adjusted to compensate for inflation. 20,21

CURRENT EXPENDITURES-The total charges incurred for the benefit of the current fiscal year, except for capital outlay and debt service. 20,21

CURRENT EXPENDITURES PER PUPIL IN ADA (REGULAR SCHOOL TERM)-Current expenditures for the regular school term divided by the average daily attendance of full-time pupils (or full-time equivalency of pupils) during the term. See also CURRENT EXPENDITURES and AVERAGE DAILY ATTENDANCE. 20,21

CURRENT EXPENDITURES PER STUDENT-Current expenditures for a particular period of time divided by a student unit of measure. The term includes all charges, except for capital outlay and debt service, for specified school systems, schools, and/or program areas divided by the average daily membership of average daily attendance for the school systems, schools, and program areas involved. 20,21

EARNINGS-The sum of wage and salary income and net self-employment income. 30,31

COLLEGE MAJOR IN EDUCATION-Is a group of institutional programs that describe the art on processess of imparting knowledge, developing the powers of reasoning and judgment, and preparing others intellectually for a more mature life. 26

EDUCATIONALLY DEPRIVED CHILDREN-As defined for Federal compensatory education programs, those children who have need for special assistance in order that their level of educational attainment may be raised to that appropriate for children of their age. The term includes children who are handicapped or whose needs for such special educational assistance result from poverty, neglect, delinquency, or cultural or linguistic isolation from the community at large. 40

ELEMENTARY SCHOOL-A school classified as elementary by State and local practice and composed of any span of grades not above grade 8. A preschool or kindergarten school is included under this heading only if it is an integral part of an elementary school or a regularly established school system. 2,24,25

ELEMENTARY/SECONDARY/SCHOOL-As reported in this publication, includes only regular schools, i.e., schools that are part of State and local school systems, and also most non-profitmaking private elementary/secondary/schools, both religiously affiliated and nonsectarian. Schools not reported include subcollegiate departments of institutions of higher education, residential schools for exceptional children, Federal schools for Indians, and Federal schools on military posts and other Federal installations. 2,20,22,23,24

ENGLISH, GENERAL-A group of instructional programs that generally describes the skills and techniques essential to learning the English language. 4,5,8,9

ENROLLMENT-The total number of entering students in a given school unit. 14,15,22

EXPENDITURES: Charges incurred, whether paid or unpaid which are presumed to benefit the current fiscal year. For elementary/secondary schools, these include all charges for current outlays for education, plus capital outlays and interest on school dept. For institutions of higher education, these include current outlays plus capital outlays. For government, these include charges net of recoveries and other correcting transaction-other than for retirement of debt, investment in securities, extension of credit, or as agency transactions. Government expenditures include only external transactions, such as the provision of prequisities or other payments in kind. Aggregates for groups of governments exclude intergovernmental transactions among the governments. 20,21

EXPENDITURES PER STUDENT-Charges incurred for a particular period of time divided by a student unit of measure, e.g., average daily attendance or average daily membership. 20,21

FOREIGN LANGUAGES-A group of instructional programs that describe the structure and use of language that is common or indigenous to people of the same community or nation, the same geographical area, or the same cultural traditions; including such features as sounds, literature, syntax, phonology, morphology, semantics, sentences, prose and verse, as well as the development of skills and attitudes used in communicating and evaluating thoughts and feelings through oral and written language. 8,9

FULL-TIME WORKER-One who worked primarily at full-time civilian jobs (35 hours or more per week) for 50 weeks or more. 30,31

GED RECEPIENTS-Persons who have obtained certification of high school eqivalency because they have met State requirements and passed an approved exam, which is intended to provide an appraisal of their achievement or performance in the broad subject matter areas usually required for high school graduation. 10,11

GRADUATE-An individual who has received formal recognition for the successful completion of a prescribed program of studies. 10,11

GRADUATION-Formal recognition given to a pupil for the sucessful completion of a prescribed program of studies. 11

HANDICAPPED-Those children evaluated as having any of the following impairments, who because of those impairments need special education and related services. (These definitions apply specifically to data from the U.S. Office of Special Education and Rehabilitative Sevices presented in this publication.)

DEAF-A hearing impairment which is so severe that the student is impaired in processing linguistic information through hearings with or without amplication, which adversely affects educational performance.

DEAF-BLIND-Concomitant hearing and visual impairments the combination of which causes such severe communication and other developmental and educational problems that they cannot be accommodated in special education programs solely for deaf or blind students.

HARD OF HEARING-A hearing impairment, whether permanent or fluctuating, which adversely affects a student's educational performance but which is not included under the definition of "deaf" in this section.

MENTALLY RETARDED-Significantly subaverage general intellectual functioning existing concurrently with deficits in adaptive behavior and manifested during the developmental period, which adversely affects a child's educational performance.

MULTIHANDICAPPED-Concomitant impairments (such as mentally retarded-blind, mentally retarded-orthopedically impaired. etc.), the combination of which causes such severe educational problems that they cannot by accommodated in special education programs solely for one of the impairments. The term does not include deaf-blind students. This category includes those students who are severely or profoundly mentally retarded.

ORTHOPEDICALLY IMPAIRED-A severe orthopedic impairment which adversely affects a student's educational performance. The term includes impairments caused by congenital anomaly, disease, and from other causes.

OTHER HEALTH IMPAIRED-Limited strength, vitality, or alertness, due to chronic or acute health problems such as a heart condition, tuberculosis, rheumatic fever, nephritis, asthma, sickle cell anemia, hemophila, epilepsy, lead poisoning, leukemia, or diabetes, which adversely affects a student's educational performance.

SERIOUSLY EMOTIONALLY DISTURBED-A condition exhibiting one or more of the following characteristics over a long period of time and to a marked degree, which adversely affects educational performance: an inability to learn which cannot be explained by intellectual, sensory, or health factors: an inability to build or maintain satisfatory interpersonal relationships with peers and teachers: inappropriate types of behavior or feelings under normal circumstances: a general pervasive mood of unhappiness or depression: or a tendency to develop physical symptons or fears associated with personal or school problems. The term includes children who are schizophrenic or autistic. The term does not include children who are socially maladjusted, unless it is determined that they are seriously emotionally disturbed.

SPECIFIC LEARNING DISABLED-A disorder in one or more of the basic psychological processes involved in understanding or in using language, spoken or written, which may manifest itself in an imperfect ability to listen, think, speak, read, write, spell, or to do mathematical calculations. The term includes such conditions as perceptual handicaps, brain injury, minimal brain dysfunction, dyslexia, and developmental asphasia. The term does not include children who have learning problems which are primarily the result of visual, hearing, or motor handicaps, of mental retardation, or of environmental, cultural, or economic disadvantage.

SPEECH IMPAIRED-A communication disorder, such as stuttering, impaired articulation, a language impairment, or a voice impairimpairment, which adversely affects a student's educational performance.

VISUALLY IMPAIRED-A visual impairment which even with correction, adversely affects a student's educational performance. The term includes both partially seeing and blind children.

HIGH SCHOOL-A secondary school offering the final years of high school work necessary for graduation, usually including grades 10, 11, 12 (in a 6-3-3 plan) or grades 9, 10, 11, and 12 (in a 6-2-4 plan). 8-13, 44,45

HIGHER EDUCATION INSTITUTIONS (traditional classification): 12-15

FOUR-YEAR INSTITUTIONS-A higher education institution legally authorized to offer and offering at least a 4-year program of college-level studies wholly or principally creditable toward a baccalaureate degree. Within this category, a university is a postsecondary institution which typically comprises one or more colleges and one or more graduate professional schools.

TWO-YEARS INSTITUTIONS-A higher education institution legally authorized to offer and offering at least a 2-year program of college-level studies which terminates in an associate degree or is principally creditable toward a baccalaureate degree.

HOME ECONOMICS-A group of instructional programs that describe the relationship between the physical, social, emotional, and intellectual environment in and of the home family, and the development of individuals. Includes instructions in the natural and social sciences and humanities in the development of attitudes, knowledge, and ability pertaining to clothing and textiles, consumer education, food and nutrition, home management, housing, human development and family studies, and instructional management. 8,9

LIFE SCIENCES-A group of instructional programs that describe the systematic study of living organisms. 9

LIMITED-ENGLISH PROFICIENT (LEP)-Children of non-English language background or language minority who have sufficient speaking, reading, writing, or understanding the English language to deny such individuals the opportunity to learn sucessfully in classroom where the language of instruction is English. As used in this publication, it is defined as scoring below a certain cutoff point on a test designed to measure English proficiency. 40

MATHEMATICS-A group of instructional programs that describe the sciences of logical symbolic language and their applications. 2-9,14 15,44,45

MEAN TEST SCORE-The score obtained by dividing the total sum of scores of all individuals in a group by the number of individuals in that group. 4,5

NATURAL SCIENCES-Include the body of related subject matter, or the body of related courses, organized for carrying on learning experiences concerned with knowledge of the physical and biological world, and of the processes of discovering and validating this knowledge. 4,5

NEWLY QUALIFIED TEACHER-A teacher who has met the specific requirements of a State or other authorizing agency, has received certification from a State, regional or national accrediting body, and thus is considered eligible and qualified to instruct students. 28,29

OTHER COURSES-Some examples of other courses are agriculture, architecture, computer and information sciences, health, and industrial arts. 8,9

PERCENTAGE OF AGE GROUP IN ALL SCHOOLS-The number of resident pupils of a given age group (e.g., 14 to 18 years of age) entered in all public and nonpublic schools, divided by the total number of residents within the age group, expressed as a percentage. 10

PERSONAL AND SOCIAL DEVELOPMENT-A group of instructional programs that describe the fundermental skills a person is normally thought to need in order to function productively in society. Some examples are career preparation, cooperative education, reading development, and study dynamics. 8,9

PERSONAL INCOME-The current income received by persons from all sources minus contributions for social insurance. 22,23

PHYSICAL SCIENCES-A summary of instructional programs that describe inanimate objects, processes of matter, energy, and associated phenomona. 8,9

PRIVATE SCHOOL-A school which is controlled by an individual or by an agency other than a State, a subdivision of a State, or the Federal government, usually which is supported primarily by other than public funds, and the operation of whose program rests with other than publicly elected or appointed officials. 2,10 14,15

PUBLIC SCHOOL-A school operated by publicly elected or appointed school officials in which the program and activities are under the control of these officials and which is supported primarily by public funds. 2,10 14,15 20,22-25

PUPIL-CLASSROOM TEACHER RATIO (for a period of time)-The average daily membership of pupils, for a given period of time, divided by the number representing the total full-time equivalency of classroom teaching assignments serving these pupils during the same period. 24,25

RACIAL/ETHNIC GROUP-Classification indicating general racial or ethnic heritage based on self-identification as in data collected by the Bureau of the Census or on observer identification as in data collected by the Office for Civil Rights. These categories are in accordance with the Office of Management and Budget standard classification scheme presented below: 10,11

WHITE-A person having origins in any of the original peoples of Europe, North Africa, or the Middle East.

BLACK-A person having origins in any of the black racial groups of Africa.

HISPANIC-A person of Mexican, Puerto Rican, Cuban, Central or South American or other Spanish culture or origin, regardless of race.

READING-Instruction designed to develop the skills necessary to perceive and react to patterns of written symbols and translate them into meaning. The teaching of reading is differentiated according to a number of levels and objectives. The continuous development of reading skills and vocabulary applies to all subject-matters areas, emphasizing selected skills and vocabulary appropriate to pupils' needs in different learning situations. 2,3,14,15

REMEDIAL READING-Planned diagnostic and remedial activities, for individual pupils or groups of pupils, designed to correct and prevent further reading difficulties which interfere with the pupil's expected progress in developing reading skills, understandings, and appreciations. 14,15

REVENUES-All funds received from external sources, net of refunds, and correcting transactions. Noncash transactions such as receipt of services, commodities, or other receipts "in kind" are excluded, as are funds received from the issuance of debt, liquidations of investments, and nonroutine sale of property. 22,23

SALARY-The total amount regularly paid or stipulated to be paid to an individual, before deductions, for personal services rendered while on the payroll of a business or organization. 30,31

SCHOLASTIC APTITUDE TEST-An examination of the potential of a person to succeed academically, as measured by tests of performance. 4,5,26,27

SCHOOL-A division of the school system consisting of students comprising one or more grade groups or other identifiable groups, organized as one unit with one or more teachers to give instruction of a defined type, and housed in a school plant of one or more buildings. 2,10,12,16

SECONDARY SCHOOL-A school comprising any span of grades beginning with the next grade following an elementary or middle school and ending with or below grade 12. 24,25

SOCIAL SCIENCES -A group of instructional programs that describe the substantative portions of behavior, past and present activities, interactions, and organizations of people associated together for religious, benevolent, cultural, scientific, political, patriotic, or other purposes. 4,5,7,8 9,44,45

STUDENT-An individual for whom instruction is provided in an educational program under the jurisdiction of a school, school system, or other educational institution. No distinction in made between the terms "student" and "pupil"; the term "student" is used to include individuals at all instructional

levels. A student may receive instruction in a school facility or in another location, such as at home or in a hospital. Instruction may be provided by direct student-teacher interaction or by some other approved medium such as television, radio, telephone, and correspondence. 2,40

TECHNICAL TRAINING INSTITUTE-An educational institution at the postsecondary level that offers specialized education in one or more fields to prepare individuals for employment in positions between those of the skilled worker or craftman and the professional scientist or engineer. The programs at these institutions may lead to an associate degree. 12

TRADE AND INDUSTRIAL OCCUPATIONS-The branch of vocational education which is concerned with preparing persons for initial employment, or for updating or retraining workers in a wide

range of trade and industrial occupations. Such occupations are skilled or semiskilled and are concerned with layout designing, producing, processing, assembling, testing, maintaining, servicing, or repairing any product or commodity. 8,9

TWO-YEAR TECHNICAL INSTITUTE-An institution offering instruction primarily in one or more of the technologies at the postsecondary instructional level. 12

VISUAL AND PERFORMING ARTS-A group of instructional programs that generally describe the historic development, aesthetic qualities, and creative processes of two or more of the visual and performing arts. 8,9

VOCATIONAL PROGRAMS-A program of studies designed to prepare students for employment in one or more semiskilled, skilled, or technical occupations. 12,13